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ABSTRACT

This 5-year study evaluates the first diploma nursing program in Canada within an educational institution, that of Ryerson Polytechnical Institute in Toronto. Various factors affecting student and Ryerson graduates performance are studied to answer two questions: (1) What type of nurse is being prepared through the Ryerson nursing program, and (2) Is this a practical way to prepare nurses? Specifically, data were collected relating to: (1) characteristics of students enrolling in the Ryerson program and of the graduates, (2) job performance as viewed from employer feedback, and (3) variables influencing the students. Comparisons were made with three progressive schools in Ontario--two large hospital schools and one autonomous school. Numerous tables present the data, which focus on seven main vectors within the system: (1) the students' personality development, (2) their increasing career orientation, (3) the benefits of Ryerson's academic freedom, (4) program activities, (5) faculty role, (6) internalizing the "professional" nursing norms, and (7) integration into the professional system. The Ryerson graduate gives good nursing care, developing both as an individual and a professional, which shows the potential value of a 6-semester college nursing program. Instruments used in the study are available as VT 019 889 in this issue. (Author/AG)

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LEARNING TO NURSE

THE FIRST FIVE YEARS OF THE RYERSON NURSING PROGRAM

Allen Reidy

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Learning to Nurse

The First Five Years of the Ryerson Nursing Program

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The Registered Nurses, Association of Ontario, 1971

FOREWORD

The nursing program established at Ryerson Polytechnical Institute in 1964 was the first diploma program in nursing conducted within the system of general education in Canada. As the prime mover in this development, the Registered Nurses' Association of Ontario committed itself to a study of the first five years of this program.

The Registered Nurses' Association of Ontario had supported the development of diploma programs under the auspices of educational institutions since 1957. Impetus was given in 1962 when the Royal Commission on Health Services suggested research be initiated to demonstrate the feasibility of recommendations submitted by nursing groups across Canada. These recommendations expressed unanimous support for nursing education within general education. The Association accepted the challenge and commenced dialogue with the Department of Education and Dr. H. H. Kerr at Ryerson. Based on their interest in the proposal, the Association engaged Miss Dorothy Rowles to carry out a study directed toward the development of a diploma program in nursing at Ryerson. The report, published in 1963, was accepted by the Board of Directors of the Association, and the nursing program was established in 1964.

In 1966, the Registered Nurses' Association of Ontario commissioned Dr. Moyra Allen to direct an evaluation study of the first five years of the Ryerson program. Although a broad study to gather information relevant to a nursing program within the system of general education was tempting, the Registered Nurses' Association of Ontario focused on two basic questions as a general guide to the study:

> How does the graduate of this program function in the employment field?
> Is this a practical way to prepare nurses in view of the influences on and within the nursing program conducted in this setting?

Initially it was hoped that the Registered Nurses' Association of Ontario could finance the project entirely, but in 1969 it became necessary to seek other sources of funds. The Association is grateful

to the Department of Health, Province of Ontario, for supporting their application for a National Health Grant. The project was funded under a national grant for the years 1969-71 in the amount of $20,000., Project No. 606-7-597.

As technological, economic, and social changes influence the role of the nurse, so the method of preparation of the practitioner must be studied and evaluated if the profession accepts its responsibility for the provision of a high quality of nursing care. There is material in this study which should assist us to participate more knowledgeably in the the development of new nursing programs. The study also presents us with a charge: Will nursing develop criteria for assessing these new types of programs so we can ensure that the graduate is in line with the function of nursing demanded by our changing health services?

The Registered Nurses' Association of Ontario is confident that this report of the Ryerson nursing program will make a significant contribution to nursing in Canada.

Laura E. Butler, President
Registered Nurses' Association of Ontario
April, 1971

PREFACE

This report presents an evaluation of the first nursing program in Canada at the diploma level to be organized within a college institution, that of Ryerson Polytechnical Institute in Toronto. The program began in 1964, the study covers a five-year period ending in 1970.

For the reader who desires an overall view of the findings, Chapter 11 gathers together the information relating to the type of graduate produced and treats the question of practicality of this method of educating nurses. Part I describes the plan of the study and the setting, the Nursing Program at Ryerson, in considerable detail. Part II presents a rather complete picture of the student learning to nurse and Part III of the faculty teaching nursing along with the nursing staff in the clinical field. Chapter 10 of Part IV is devoted to the performance of the Ryerson graduate and Chapter 12 portrays various patterns of teaching nursing which have emerged during the course of this study. Individual chapters may contain a *summary* of the findings; *discussion* — the researchers' response to the findings; and *conclusions* or summary statements relating the findings to the purpose of the section. Materials on the development and validation of instruments and scales are presented in the Appendix, which the Association will publish separately.

This study to evaluate a new type of nursing program was undertaken at the request of the Registered Nurses' Association of Ontario. Having participated in, studied, and explored the teaching of nursing for many years, this offer provided an exceptional opportunity to gather more precise data on learning to nurse as well as on the teaching process. Certain conditions were agreed upon with the Association in the early stages:

1. Final or general statements as to the value of this new type of program would be made by the nursing profession and other interested groups: The research task would be to gather as much relevant information as possible to provide

a knowledge base for such decisions and judgments of value.

2. Responsibility for the design of the study and the content of the report would rest with the research team.

Mrs. Mary Reidy accepted the position of Research Associate to the project and although involved in all aspects, undertook major responsibility for the study of students and graduates of the Ryerson program. Mrs. Mae Yoshida of Toronto participated with both of us in the collection of data on the performance of Ryerson graduates from employers and co-workers, i.e. directors of nursing, head nurses and staff nurses. Mrs. Helen Moogk Elfert of McGill University and later of the University of British Columbia developed the means to assess creativity of students and nursing staff in responding to problem situations in nursing and of faculty in their approach to curriculum problems. Many others read and responded to first drafts or participated in the preparation of final copy: Miss Kay Arpin, Consultant, College of Nurses, Ontario; Dean Catherine Aikin, Faculty of Nursing, University of Western Ontario; Miss Mirth Doyle and Miss Joan Gilchrist, colleagues at the School for Graduate Nurses, McGill University; Mrs. Mae Yoshida, Toronto; and lastly, Martin Reidy, Mary Reidy's husband and Associate Professor, Department of Philosophy, Loyola University. Much appreciation is owed to Miss Elizabeth Logan, Director, School for Graduate Nurses, McGill University, for facilating the necessary conditions : time, space, equipment and various other resources of the school and university. Our typist for the final drafts and copy has been Mrs. Ellen Samlal, a most patient and disciplined assistant.

We were assisted throughout the study by the willingness of all people at Ryerson, in particular Miss Dorothy Rowles, to discuss, clarify, make materials available, and generally to permit us to observe in any sphere of activity. We wish to express our most sincere gratitude to the Directors of Nursing of the hospitals cooperating with Ryerson in the provision of clinical facilities. They and their staff participated readily helping us gather information from many sources. A great deal of appreciation is owed by the nursing profession to the faculty and students of the three schools studied for comparative purposes; of necessity, theirs has been a passive role in this project. A strong support and counsellor who stayed thoughout the study has been Miss Laura Barr, Executive Director of the Registered Nurses' Association of Ontario.

M.A.
Montreal, 1971

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PART I

INTRODUCTION

CHAPTER 1
METHOD

EVALUATIVE RESEARCH

Studies of educational institutions and their programs vary in approach. One may analyze the formal philosophy, curriculum, administration, and other aspects of the school as has been done in many studies in nursing education. Another possibility is to attempt a systematic description of the dynamic reality of the particular situation or program. The latter view is well demonstrated in the Sanford studies of higher education in the United States.[1] Here the researchers look at individuals and groups involved in learning, in teaching, and in administration. They study the dynamics of these processes to identify common patterns, relational variables, and the consequences for individuals and groups in terms of development and learning.

Evaluative research represents an attempt to utilize the scientific method for the purpose of assessing the worth of an activity in reaching particular objectives, and further, according to Suchman, such research is concerned with determining whether the goals themselves are valid.[2] At the time of the present study, the Nursing Department at Ryerson had outlined some general goals or objectives to guide the development of their program.

> The Ryerson course is directed toward those aims which relate to the nurse who has a broad education; a sound basis in the sciences including behavioral sciences; a thoughtful and analytical approach to the nursing of patients; an independent, questioning, and confident outlook on nursing care and on health services in general.[3]

In the present study, we have gathered data related to these types

of goals and accumulated information on the nature of nursing learned and later performed in the work situation.

The purpose of this research is *not* to show that nursing programs *are* or *are not* feasible within educational institutions. The location of programs for the preparation of the diploma nurse in educational institutions has long been accepted as a goal of organized nursing. Undoubtedly, it is the consensus of our society that preparation of persons in any type of complex skill, involving a basis in both science and the humanities, should be placed within the system of general education. For this reason, the approach to the present research project has been to assume that nurses *can* be prepared in educational institutions. Furthermore, it assumes that many factors influence this process either to support and to augment development or to impede and place barriers in the way. With this view in mind, the study has aimed to examine the type of nurse which is produced through the Ryerson program and to identify some of the conditions responsible. Secondly, the study has been designed to explore factors related to the practicality of this method of preparing nurses; problems which appear to threaten practicality are examined.

Research findings arising out of this project apprise us of Ryerson's achievement with respect to its overall goals; however, the extent to which the goals themselves may be deemed valid rests largely on the judgment of other groups concerned with nursing and nursing education, such as the Registered Nurses' Association of Ontario, the College of Nurses, and the Ministries of Health and of Education.

From our viewpoint, in studying a new program for the preparation of nurses, it seems reasonable to focus less on the formal aspects of curriculum and teaching and more on how students learn to nurse and how the nursing department operates in an educational setting. Briefly, the objects of this research are:

1. To determine the factors in the situation which appear to influence students as they learn to nurse, and

2. To identify the consequences for students with respect to what they learn and the type of nurse they become, and

3. To describe and assess the major factors in the situation which support or, on the other hand, interfere with the operation of the nursing education program, and

4. To study the performance of Ryerson graduates and how they *fit* into the work world.

Suchman decries the failure of most evaluative research for not

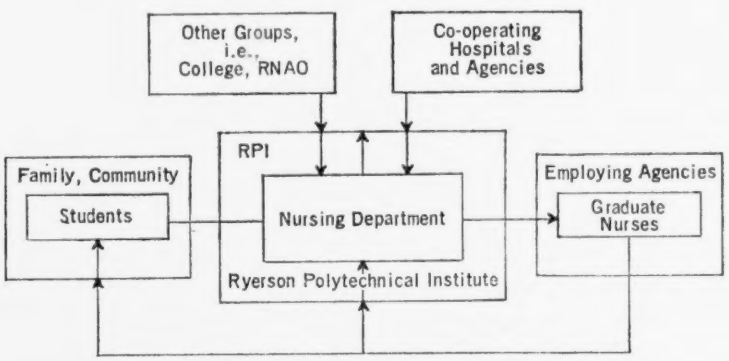
attempting to analyze sources of difficulties and for not setting forth guiding principles or procedures to help lessen if not overcome some of the problems. In addition to the above objects, therefore, the present study is directed to some of these ends, albeit in a moderate fashion.

DESIGN

To permit a flexible approach to an exceedingly complex situation, a general systems orientation has been utilized in the research design. To quote from Bertalanffy:

> Systems of course have been studied for centuries, but something new has been added . . . . The tendency to study systems as an entity rather than as a conglomeration of parts is consistent with the tendency in contemporary science no longer to isolate phenomena in narrowly confined contexts, but rather to open interactions for examination and to examine larger and larger slices of nature[4].

We have looked at Ryerson as a large system incorporating a number of subsystems. The present research views the subsystem of the student as the particular unit of study and conceptualizes the elements of the system and the major reciprocal relations as follows:



The systems approach provides for observation of the students as they move into, through and out of the system. It enables one to identify what effects the output of the system (the graduates) have on future intake (student recruited into the program), either directly or through the various groups which impinge on and influence the unit of study. Other groups, such as faculty, administration, other

students, hospitals and agencies who cooperate in the provision of clinical experience, organizations and associations such as the Registered Nurses' Association of Ontario and the College of Nurses, may be considered as they influence the primary unit of study in the larger system, that is students learning to nurse. These influences are assessed with respect to the support and positive value they appear to bring to the nursing program at Ryerson or, on the other hand, to the problems which they present and how these seem to be managed within the short time span of this study. In other words, the plan involves looking at the units of the system to identify how they interact with each other in terms of influence and *fit*. How does one part influence another and to what extent does one part fit with another? *Fit* may be defined as the extent to which two or more parts are similar or consistent with each other on some particular dimension. Basically the model provides direction for the crucial types of data required:

1. The characteristics of students who enrol in the Ryerson nursing program.

2. The nature of the influence on these students as they learn to nurse: from teachers of nursing and other faculty at Ryerson, from courses in the curriculum, other students, cost, living arrangements, and from nursing personnel in cooperating agencies.

3. The characteristics of the Ryerson graduate and her performance and *fit* in the work world.

4. The feedback over time from employers and professional bodies (nursing) to the community and to Ryerson and its nursing department.

A complete follow-up of this nature would take more time than allowed for this study. However, initial responses of graduates and of their employers may be assumed to portend at least the immediate future. In addition, the mechanics for continued study will be available to collect data in subsequent years.

5. The organizational and administrative relations which exist between nursing and other levels of the hierarchy.

To augment the power of the study comparable data have been collected from the students and faculty of three other diploma schools of nursing — two large hospital schools and one autonomous school. Evidence gathered across institutions permits a degree of generalization which is not possible in the study of one institution. In the selection of the three schools of nursing, no effort was made to ob-

tain a representative sample, but rather to gather information from three schools in Ontario in close proximity to the Ryerson project and Toronto, differing from each other yet having the reputation of being progressive. The first, School A, is a well-established, two-year program organized independently of hospital control; the second, School B, a large hospital school with religious affiliation, in the initial phases of curriculum reconstruction to a two-plus-one program; and the third, School C, a large hospital school endeavoring to achieve autonomy from the hospital and to implement a new two-year curriculum.

COLLECTION OF DATA

Exploratory study in the preliminary phase involved looking into all aspects of the Ryerson program and gathering information on the setting and the various groups which were thought to have expectations of the Ryerson program and a degree of influence on it. Observation, individual and group interviews, and examination of records, outlines, and calendars were used initially and later throughout the three years of the study to gather more specific data, to check on information, and to test out ideas.

Early in the study an all-day session was held with the Liaison Committee[5] to the Ryerson Evalution Project to identify areas of concern which might be legitimately considered to fall within the penumbra of the questions posed by the Registered Nurses' Association of Ontario:

1. What type of nurse is being prepared through the Ryerson nursing program?

2. Is this a practical way to prepare nurses?

The basic direction of the research plan derived from the discussion of this meeting. Later the general nature of the evaluation project was presented to the following groups for discussion and suggestions to assist the researchers to clarify and sharpen the focus of the research questions.

Board of Directors of the Registered Nurses' Association of Ontario

Faculty of the Ryerson Nursing Department

Advisory Committee to the Ryerson nursing program (meeting attended by the President of Ryerson Polytechnical Institute)

Director, College of Nurses

Subcommittee on Nursing Education of the Ontario Council on Health

Director, School of Nursing, University of Toronto

Director, Applied Arts and Technology Branch, Ontario Department of Education

To discuss the progress of the study, a subsequent meeting was held with the Liaison Committee and with the Board of Directors of the Registered Nurses' Association of Ontario. Throughout the study contact was maintained with the Executive Secretary of the Registered Nurses' Association of Ontario.

On the basis of the preliminary work and study the general research questions were broken down into more specific questions. Some of the questions are as follows:

1. Who are the students who are recruited into the Ryerson program? What are the characteristics and motivation of these students?

What factors in their several environments influence the nursing students in the Ryerson program, i.e. affect their learning? What values and characteristics as nurses do they espouse throughout the program?

What do students do in the program? How and where do they spend their time? What changes in general outlook occur in students? Where do they seek employment? What are their work and career patterns? What is their work performance and how do they get along? What nursing values do they and others hold in the work situation?

2. What are the characteristics of the faculty who come to the Ryerson program to teach nursing? Who are they and what is their preparation? What type of nurse are they trying to prepare? How do they teach nursing?

3. Where do the Ryerson students obtain their clinical experience, i.e. the cooperating hospitals and agencies? What are the values and attitudes re nursing and nursing education held by the nursing service staff? What problems do they and the Ryerson faculty encounter in the Ryerson program? How are these problems managed?

4. Some attack has been levelled at the new programs in nursing education as to whether students can "learn to take responsibility". As this concern was raised a number of times in the initial discussions, the question was posed: How do faculty and how do nursing service personnel teach students to take responsibility and what sort of

"responsibility behavior" do the Ryerson graduates exhibit in the work situation?

5. To what extent does the nursing program appear to fit into an educational institution? What influences derive from the technical focus of the organizational goal?

Information on these questions was obtained from many sources. Numerous periods of observation and interview with individuals and groups were held to gain impressions and to gather material relevant to specific questions. An outline of these sessions, with the number of meetings or periods of observation follows:

Ryerson — Administration

Principal Ryerson Polytechnical Institute prior to 1966 . . . 1
President, Ryerson Polytechnical Institute during the period 1966-69 . . . 1
Director of Finance . . . 1
Director, Department of Health Sciences . . . 2

Ryerson — Other Departments

Supervisor and Instructors in Sociology and Psychology . . . 3

Cooperating Hospitals

Directors of Nursing and/or Nursing Office Staff . . . 5
Group interview with head nurses and supervisors of one cooperating hospital . . . 1

Ryerson — Nursing Department

Numerous sessions
- Supervisor, later Chairman, of the Nursing Department
- Individual Faculty members
- Members of the Graduating Class — individual and group

Staff meetings and Curriculum Planning meetings . . . 4
Faculty members — group . . . 2
Observation of students and faculty in the clinical field . . . 11 days
- Teaching of nursing
- Nursing performance of students
- Nursing conferences

Ryerson Graduates in the Work Situation

Directors of Nursing . . . 13
Head Nurses . . . 16
Ryerson graduates . . . 23

Information and understandings gleaned from observation and interview began to provide a picture of the Ryerson nursing program, and thus a firmer foundation for the construction of quantitative measures emerged. Some of the critical questions which we had posed were translated into behavioral operations and instruments developed or adapted to measure the qualitative aspect of these dimensions. It was considered vital that a body of objective data be obtained for purposes of quantification. In addition to their use at Ryerson, these instruments constituted the major data-collecting devices for students and faculty in Schools A, B and C, the three schools of nursing selected for study to provide a comparative focus.

The following chart identifies the data-collecting devices, including the instruments used to measure specific qualities. It may be noted that data were collected from four major groups — students at Ryerson and in Schools A, B and C; faculty at Ryerson and in Schools A, B and C; nursing staff in five hospitals cooperating with the Ryerson program in the provision of clinical experience; Ryerson graduates and nursing staff in the work situation. The number of persons involved in each section of the study is noted at the bottom of the chart. A description of each instrument and its development is included in the relevant chapter of this report. A copy of each instrument along with a description of the validity and reliability checks are available in the Appendix to the study, which is published separately.

As change in students throughout their program is an essential aspect of the study, we measured some responses and nursing behaviors of the students at different periods of the program for the purpose of establishing anchor points of known information. We were then in a position to consider change from one anchor point to another. The following diagram portrays change, development and attitude formation in the Ryerson nursing student beginning with the *Recruit,* moving on to *Life as a Student,* then to the *Graduating Student,* and finally to the *Graduate Nurse at Work.* The diagram clearly indicates how each instrument contributes information on the Ryerson student as she is learning to nurse and later as a graduate nurse in the work situation.

THE MEASUREMENT OF CHANGE, DEVELOPMENT AND ATTITUDE FORMATION IN THE RYERSON NURSING STUDENT AND THE SUBSEQUENT "FIT" OF THE GRADUATE INTO THE WORK WORLD

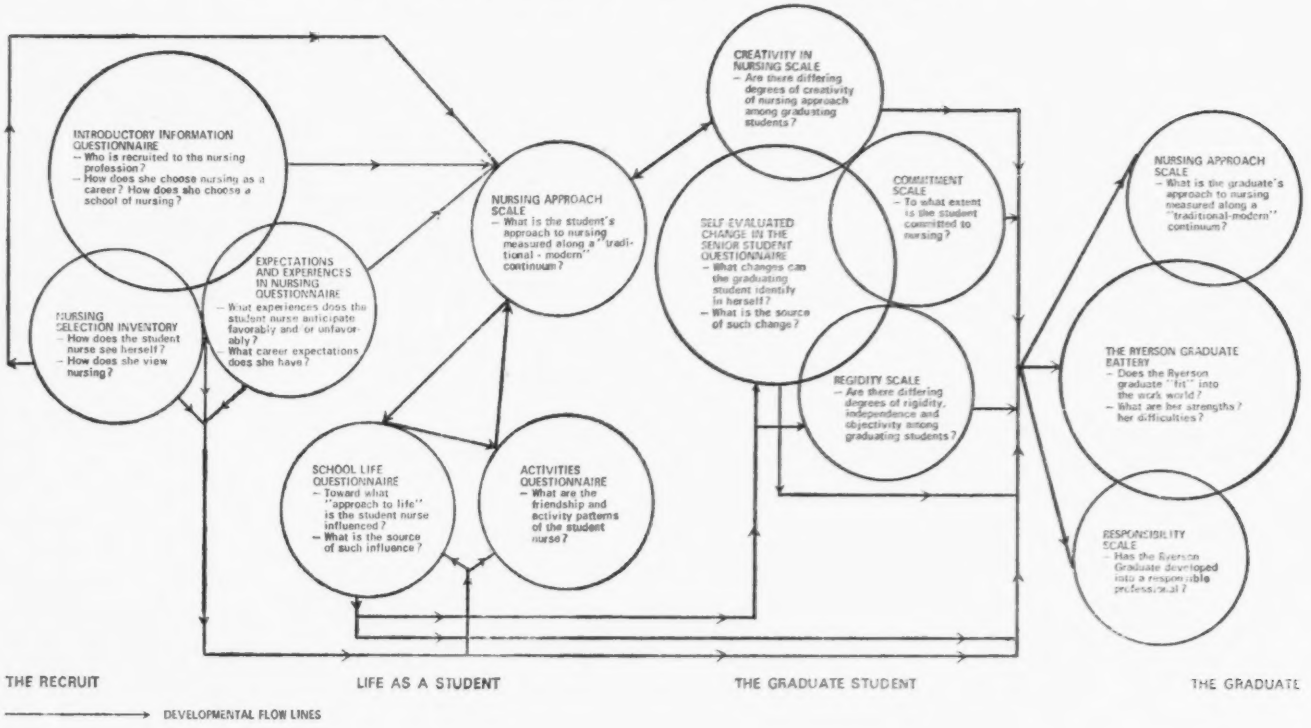

INTRODUCTORY INFORMATION QUESTIONNAIRE
– Who is recruited to the nursing profession?
– How does she choose nursing as a career? How does she choose a school of nursing?
NURSING SELECTION INVENTORY
– How does the student nurse see herself?
– How does she view nursing?
EXPECTATIONS AND EXPERIENCES IN NURSING QUESTIONNAIRE
– What experiences does the student nurse anticipate favorably and or unfavorably?
– What career expectations does she have?
NURSING APPROACH SCALE
– What is the student's approach to nursing measured along a "traditional - modern" continuum?
CREATIVITY IN NURSING SCALE
– Are there differing degrees of creativity of nursing approach among graduating students?
SELF EVALUATED CHANGE IN THE SENIOR STUDENT QUESTIONNAIRE
– What changes can the graduating student identify in herself?
– What is the source of such change?
COMMITMENT SCALE
– To what extent is the student committed to nursing?
RIGIDITY SCALE
– Are there differing degrees of rigidity, independence and objectivity among graduating students?
SCHOOL LIFE QUESTIONNAIRE
– Toward what "approach to life" is the student nurse influenced?
– What is the source of such influence?
ACTIVITIES QUESTIONNAIRE
– What are the friendship and activity patterns of the student nurse?
NURSING APPROACH SCALE
– What is the graduate's approach to nursing measured along a "traditional-modern" continuum?
THE RYERSON GRADUATE BATTERY
– Does the Ryerson graduate "fit" into the work world?
– What are her strengths? her difficulties?
RESPONSIBILITY SCALE
– Has the Ryerson Graduate developed into a responsible professional?
THE RECRUIT
LIFE AS A STUDENT
THE GRADUATE STUDENT
THE GRADUATE
DEVELOPMENTAL FLOW LINES

CHART 1
INSTRUMENTS AND PROCEDURES FOR THE COLLECTION OF DATA

Students at Ryerson and in Schools A, B and C	Faculty at Ryerson and in Schools A, B and C	Nursing Staff in 5 Hospitals Co-operating with Ryerson Program[T]	Ryerson Graduates and Nursing Staff in Work Situations
	Information and Open-ended Questions[E]		
Introductory Information	Introductory Information	Introductory Information	
	Open-ended Questions —	Open-ended Questions —	Open-ended Questions —
	Critical Aspects of Nursing	Evaluation of Student Performance	Placement and Orientation
	Evaluation of Student Performance	Evaluation of Ryerson Program	Evaluation of Nursing Performance
	Evaluation of Program	Participation in the Ryerson Program	Expectations and Impressions of Early Work Experience
	Instruments and Scales		
Nursing Approach Scale[E] — Junior* and Senior Students	Nursing Approach Scale	Nursing Approach Scale	Nursing Approach Scale — Head nurses, staff nurses and Ryerson graduates
Creativity in Nursing[E] — Senior Students and Junior Students in School A	Creativity in Curriculum	Creativity in Nursing	
	Learning to Take Responsibility — Direction or Problem-Solving (Form A)[E]	Learning to Take Responsibility — Direction or Problem-Solving (Form B)	Taking Responsibility as a Graduate -Direction or Problem-Solving (Form C) (Head nurses and Ryerson graduates)
	Choosing a Job in Teaching[E]		
	Open and Closed Belief Systems[D]		
Expectations and Experiences in Nursing Activities Questionnaire[E], Junior and Senior			

School Life Questionnaire[B]

Change and Development in Senior Students

Rigidity Scale [C], Senior Students

Commitment to Nursing[E],

Senior Students

Number of Students				*Number of Faculty*		*Number of Nursing Staff*		*Number in Work Situation*	
	Beginning	*Junior**	*Senior*			*Hospital X*			
Ryerson	24	22	26	Ryerson	11	Supervisory	4	Ryerson Graduates	23
School A	60	46	51	School A	16	Head Nurses and Assistants	19	Head Nurses	16
School B	124	71	45	School B	30	Staff Nurses	14	Directors of Nursing	13
School C	109	66	73	School C	27	Hospitals Y, Z, V and W	17		

[A]Modification and Development of Robson's initial work in this field.

[B]A modification of Pace's Instrument. The professional influence has been added.

[C]A modification of an instrument developed and used by Sanford and Katz.

[D]A transposition of Rokeach's Dogmatism Scale to the field of nursing.

[E]Scales or Questionnaires developed for this study.

*Note: Junior students are students who have completed approximately one-half of their nursing program.

ADMINISTRATION OF QUESTIONNAIRES, SCALES AND INSTRUMENTS

The questionnaires and instruments were grouped in packets for the individual student in the Beginning, Junior and Senior classes. Instructions were identical for students in all programs. Students recorded responses on IBM cards with the exception of the open-ended questions on the Creativity in Nursing instrument. In Schools A, B and C all students in the particular class gathered at an appointed time in a classroom in their hospital or school and responded to the questionnaires during a prescribed period of time under the supervision of the researcher. At Ryerson usually more than one session was required to obtain a majority of students in each class. However, the same procedure as for students in Schools A, B and C was followed for the small groups of Ryerson students. It is felt that the questionnaires were sufficiently complex and extensive that information could not have been conveyed from one group to another. Whereas all students were asked to complete the questionnaires in Schoools A, B and C, only those students at Ryerson who wished to participate did so. Owing to an oversight, the questions on Creativity in Nursing were omitted from the packets for School C seniors and for one group of Ryerson seniors. These questions were administered to Ryerson seniors at a later date. Students were given fifteen minutes to complete the question, approximately the same amount of time as provided in the packet of questionnaires. Two students, who were unavailable at the time, completed the questions on their own, having agreed ahead of time to the fifteen minute time limit.

Packets of questionnaires were presented to faculty at Ryerson and in Schools A, B and C and were completed under the supervision of the researcher with similar instructions and conditions prevailing in all four situations. In the cooperating hospitals, the Director of Nursing gathered together her staff from the units in which Ryerson students were assigned. In one or two sittings, in the presence of the researcher, the questionnaires were completed under reasonably similar conditions. Three researchers participated in the study of the Ryerson graduates in the employment situation. Individual interviews were held with the directors of nursing, head nurses and Ryerson graduates. The Nursing Approach Scale and the Creativity in Nursing instruments were administered by the researcher to the head nurse, staff nurses and the Ryerson graduates.

PRESENTATION AND ANALYSIS

A general proposal for the collection of information relevant to the evaluation of a nursing education program has been presented. Im-

plicit in the research design is an assumption basic to evaluation: The need to know a great deal about something before placing value on it. For this reason, the thrust of this project is directed toward a detailed description of what is happening in this novel type of program in nursing education. In the analysis of much of the quantifiable data, differences between Ryerson students and faculty and those from Schools A, B and C are assessed by means of the *t test,* one-way analysis of variance or correlation measures. Differences are considered significant at the .05 level. However, the power of the study lies in the composite picture portrayed by the findings — students, faculty, nursing service personnel, and employers and co-workers. As may be noted from the chart, some qualities or aspects are measured across groups; for example, information on the values which nurses hold is obtained from students, faculty, nursing staff in cooperating hospitals and from Ryerson graduates and nursing staff in the employment situation. Chapter 4 through 10 considers the findings for each of these four groups. Chapter 11 examines all of the findings pertaining to the Ryerson situation, thereby permitting inferences related to factors influencing students as they learn to nurse and the congruency or degree of *fit* of one group with another. The final chapter reflects on the findings in relation to some of the critical issues in nursing education.

The major valuing problem still remains with the nursing profession as it strives to find suitable criteria for evaluation. As we consider the new educational programs across the country it becomes apparent that the profession must generate criteria relevant to these programs and to their graduates. Certainly criteria appropriate for traditional programs cannot be resurrected to assume this vital function, nor can the philosophical basis of prevailing criteria be re-interpreted to encompass the requirements of our changing goals and methods. In addition, our rapidly developing health services demand a paradigm to reflect and guide the expanding role of nursing.

Footnotes

1. N. Sanford, *The American College* (New York: John Wiley and Sons Inc., 1962).
2. E. Suchman, *Evaluative Research* (New York: Russell Sage Foundation, 1967).
3. Communications from faculty of the Ryerson Nursing Program, 1966-67.
4. L. von Bertalanffy, "General System Theory. A Critical Review" in W. Buckley's *Modern Systems Research for the Behavioral Scientist* (Chicago: Aldine Pulishing Co., 1968).
5. A special Committee of the Registered Nurses' Association of Ontario.
6. Hospital X — a medium-size private, general hospital
   Hospital V — a medium-size general hospital
   Hospital W — a large psychiatric centre
   Hospital Y — a medium-size facility for chronic illness and convalescence
   Hospital Z — a medium-size general hospital

PART I

INTRODUCTION — DESCRIPTION OF THE SYSTEM

CHAPTER 2

THE NURSING PROGRAM AT RYERSON

THE BELIEF that nursing education should be within the general system of education has been associated with our profession at least from the beginning of the twentieth century and has increasingly dominated the literature with each passing decade. Post-graduate courses for nurses within the university appeared at the turn of the century in the United States and around 1920 in Canada. Programs providing basic nursing preparation could be found within the university in the 1920's in the United States and somewhat later in Canada. Actually the move to incorporate the teaching of nursing proper into the university basic nursing course, as opposed to the regular shortened version of the hospital-based program sandwiched between university courses, has been a more recent addition, in the 1940's in Canada.

Following World War II there was renewed vigor within the nursing profession in Canada to demonstrate that a nurse could be prepared more effectively and in a shorter period of time if the nursing school were autonomous, that is, removed from the control, financial and otherwise, of the hospital. Such a project, sponsored by the Canadian Nurses' Association, was demonstrated in the Metropolitan School of Nursing in Windsor by Miss Nettie Fidler and her associates. The evaluation of this project is recorded in the Lord Report.[1] Dr. Lord's findings may be summarized in the following excerpt from his report:

> The conclusion is inescapable. When the school has complete control of students, nurses can be trained at least as satisfactorily in two years as in three, and under better conditions, but the training must be paid for in money instead of in services.[2]

The progress of the Metropolitan School was closely watched by

nurse educators in both Canada and the United States. However, further developments to strengthen the education of nurses occurred, not in Canada, but in the United States within the rapidly growing community college system. As the college movement swept the United States, another location for diploma nursing education outside hospitals and other than the independent, autonomous school of nursing, became a reality. The idea to prepare the "nurse technician" in the community college was developed, nurtured, and supported by Dr. Mildred Montag, of Teachers College, Columbia University, in her writings in the mid-1950's[3] An experimental project to develop and assess community college programs in nursing was supported by the Kellogg Foundation and directed by Dr. Montag. Aspects of the evaluation project are reported in *Community College Education for Nursing*[4] and *Nursing Education in Community Junior Colleges*.[5]

Canadian nurses made their first concerted attempt to dislodge diploma nursing education from hospital jurisdiction through the Royal Commission on Health Services. Submissions from nursing associations, schools of nursing, and other groups, one after the other, suggested changes in nursing education, — within the general system of education or as independent, autonomous schools, and usually expressing the concern that the programs be experimental and be assessed. The features which the nursing profession desired in locating nursing education within the general system of education may be summarized as follows:

1. Extension of the general education of the nurse beyond high school, — languages, history, political science, philosophy, etc.

2. Augmentation both in quality and quantity of the nurse's scientific knowledge, — biology, sociology, psychology, physiology, etc.

3. Nursing a part of an educational institution where both faculty and students could associate, work, and learn with their counterparts from other fields who were also engaged in obtaining a sound general education and scientific base for one of the technologies.

4. Availability of a multitude of resources of the larger educational institution as part of the community.

5. Control of the students' learning experiences in the hospital or agency situation and the elimination of service requirements characteristic of the hospital school of nursing.

6. Opportunity for students to make arrangements for living accommodations satisfactory to them, in lieu of the residential require-

ment in the hospital school of nursing, thereby fostering independence in the student and lessening the effects of the "total institution", the residence and hospital.

Acting upon the recommendations of the Hall Commission Report, the Registered Nurses' Association of Ontario began in 1962 preliminary investigations into the possibility of setting up an experimental nursing program, post-high school but within an educational institution. At that time in Ontario the Ryerson Polytechnical Institute was the only setting fulfilling these requirements other than the system of universities. Many questions had to be answered. Would Ryerson have the facilities to prepare an adequate number of nurses? Was Ryerson interested in developing a nursing course? Could a school of nursing be established there that would meet the standards of the nursing profession yet function within the policies and organizational structure of Ryerson? In 1963 the Registered Nurses' Assotion of Ontario recommended that a project be initiated to judge the feasibility of organizing and operating such a school at Ryerson.[6] Subsequently, Miss Dorothy Rowles, previously employed as an inspector of schools of nursing by the Department of Health and more recently on educational leave, was asked to conduct a study to determine the possibility of developing a diploma nursing program at Ryerson Polytechnical Institute.[7] This project consisted of identifying the general policies of Ryerson, developing a nursing program which would meet provincial standards yet operate within the Ryerson policies, and finally, ascertaining the availability of clinical facilities. Miss Rowles' report outlining a proposed nursing program at Ryerson Polytechnical Institute was published by the Registered Nurses' Association of Ontario in 1963.[8] Admission requirements were stated as follows:

> . . . in order to ensure that these students had "good ability and a good general education" it was decided that the entrance requirement for the Ryerson program should be the Secondary School Graduation Diploma obtained in the five-year program with a 60% overall average and papers in History, English, Mathematics and Science.[9]

Some of the conclusions of Miss Rowles' project were as follows:[10]

1. The proposed nursing course at Ryerson Institute of Technology is in accord with the principles underlying the criteria enumerated in the 1957 report of the Working Party on Basic Nursing Programs (Registered Nurses' Association of Ontario) . . .

2. The nursing course will have an advisory committee.

3. The teaching staff will be well prepared, their qualifications exceeding the recommendations of the Working Party.

4. The gross figure of one full-time instructor to every ten students enrolled in the school which was recommended by the Working Party had to be refined in order to have meaning for a nursing course at Ryerson. In the clinical field a ratio of one instructor to ten students in Nursing II and Nursing III was considered adequate. In laboratory periods in the biological sciences and in seminar periods the ratio will be one instructor to twelve or fifteen students. In subjects taught by lecture method, the ratio of instructor to students will be much lower. Refined in this way the ratio of instructors to students in the proposed nursing course at Ryerson will meet the intent of the Working Party recommendation.

5. The school will have control of the student's experience both in the classrooms and in the clinical field.

6. The hours during which the student is committed to course work, both theory and practice, will not exceed thirty hours per week. The time which students devote to individual study will be the responsibility of the student.

7. Although the entrance requirement and the length of course differ from those enunciated in the Report of the Working Party, the students enrolled will have good scholastic ability and good general education and the course, although slightly longer in teaching time than a two calendar year program, will be shorter than those programs presently offered in hospital administered schools of nursing.

8. There are sufficient clinical fields available for nursing experience.

9. Since the nursing program set forward in this report differs from present diploma programs in administration, organization and program of study, it would seem wise, if instituted, to consider it as an experiment in nursing education. As such, it will be initiated on the understanding that the Registered Nurses' Association of Ontario will conduct an evaluation at the end of a stated period of time.

Eventually the plan for the Nursing Program at Ryerson was accepted. Directors of hospitals which did not have schools of nursing were approached with the plan and a number were interested to negotiate an arrangement if the program became a reality. Miss Dorothy Rowles was hired to develop the nursing program at Ryerson and the first class was admitted in September 1964.

For a description of the nursing program at Ryerson, as it existed in 1964, we approached Miss Dorothy Rowles, Acting Dean of the

Department of Community Services, and Miss Roslyn Klaiman, Chairman of the Nursing Department. An outline of their statement follows:[11]

> The Nursing Program developed at Ryerson Polytechnical Institute was the first diploma course in Canada to be offered under educational auspices. Successful completion of the course qualifies Ryerson graduates to write the Registration examination of the College of Nurses of Ontario as is true of all other approved programs in Ontario. The aim of the course was, at its inception, and still is, as follows:
>
> The graduation of nurses who will be qualified to accept positions as staff nurses in active treatment hospitals or other institutions for the care of mentally and/or physically ill persons of all ages. In addition, the graduate will be qualified to function in any other capacity which requires similar skills and knowledge to those of the staff nurse, e.g. in private duty nursing, in medical clinics and doctors' offices.

The course content in 1964 was as follows:

1964-1966 (inclusive)

SUBJECT	*HOURS/WEEK*
FIRST YEAR	
Psychology	3
Nutrition	3
English	4
Biological Science	4
Microbiology	2
Nursing I	12
TOTAL	28
SECOND YEAR	
Growth and Development	4
Sociology	3
Disease and Therapy	3
Development of Western Thought	3
Nursing II	17
TOTAL	30
THIRD YEAR	
Community Provisions for Health	4
Disease and Therapy	3
Nursing III	22
TOTAL	29

In the first year Nursing comprised 43 per cent of the course; Social and Physical Sciences, 43 per cent; and Humanities, 14 per cent. In the second year, Nursing reached 57 per cent; Social and Physical Sciences, 33 per cent; and Humanities, 10 per cent. In the third year Nursing, 69 per cent; and Social and Physical Sciences, 31 per cent. The total program was composed of 59 per cent Nursing; 33 per cent, Social and Physical Sciences; and 8 per cent, Humanities.

The basic admission requirements for the above program, as for most programs at Ryerson, was the Ontario Secondary School Graduation Diploma, awarded at the completion of the fourth year of a five-year program.

During the Fall and Winter of 1966-67 the Faculty of the Nursing Department prepared a brief for submission to the Faculty Council of the Institute recommending that the Program be altered to a six consecutive semester pattern utilizing the summer semesters, and that, coincidental with this change, the subjects within the Program be

The revised curriculum was as follows:

SUBJECT	*PERIODS/WEEK*
FIRST SEMESTER	
English	4
Nutrition	3
Psychology	3
Physiological Sciences I	4
Nursing I - Introduction to Nursing	12
TOTAL	26
SECOND SEMESTER	
English	3
Psychology	3
Physiological Sciences 2	6
Nursing II — Care of the Surgical Patient	16
TOTAL	28
THIRD SEMESTER	
Politics	3
Sociology	3
Physiological Sciences 3	2
Nursing III — Care of Mother and Infant	16
TOTAL	24

SUBJECT	*PERIODS/WEEK*
FOURTH SEMESTER	
Child Development	3
Politics	3
Sociology	3
Psychopathology	2
Nursing IV — Care of the Psychiatric Patient	16
TOTAL	27
FIFTH SEMESTER	
Philosophy	3
Community Health	3
Physiological Sciences 5	3
Nursing V — Care of Children and Adults with Medical and Surgical Conditions	17
TOTAL	26
SIXTH SEMESTER	
Philosophy	3
Physiological Sciences 6	2
Nursing VI — Care of Children and Adults with Medical and Surgical Conditions	23
TOTAL	28

revised. The reason given for the alteration from a three-year semester Program was that an increasing number of nursing schools in the Province were offering or planning to offer the diploma course in two years. It was believed that by shortening the period of time between admission and graduation, the Institute would be in a better competitive position for students, while maintaining the amount of time a student spends in the Program. The proposed subject revision within the Program was based on the staff's opinion that the Physical and Biological Sciences were receiving too much emphasis while the Humanities and other general education subjects received too little. In addition to these changes there were internal changes within the nursing courses themselves. The recommendations contained in the brief were approved by Faculty Council and the Board of Governors in February 1967, and came into effect for students entering the Program in September of that year.

With the revised program the proportion of hours were:

Nursing	62%
Physical and Social Sciences	25%
Humanities and General Education	12%
Physical Education	1%

A short description of each of the courses taught by faculty of the Nursing Program follows:[12]

PHYSIOLOGICAL SCIENCE 1

An introduction to normal body functions and the maintenance of equilibrium. Each unit will stress man's day-to-day existence in his environment. Within this context, anatomic and physiologic characteristics of cells, tissues, organs and systems of the body will be studied.

NURSING I

Study of the basic health needs of individuals; the meaning of illness to the individual and to the family; the role of the health professions in maintaining or restoring health.

Experience in assisting the less acutely ill person in hospital to meet his basic health needs; identifying the nurse's role in the hospital community; developing and carrying out a plan of nursing care.

Introduction to medical and surgical aseptic technique, to common diagnostic procedures, and to methods of recording and transmitting information.

PHYSIOLOGICAL SCIENCE 2

The body's reaction to trauma, to aging and to degenerative processes; fluid, electrolyte, and acid-base balance and imbalance.

NURSING II

Experience in caring for patients during the pre-operative and post-operative period; the development of communication skills; use of sterile technique; and the administration of medications.

PHYSIOLOGICAL SCIENCE 3

Study of the physiology of pregnancy, and of the characteristics and physiology of the newborn. Brief study of maternal and infant pathophysiology.

NURSING III

Study of the meaning of birth to the mother, family and community, plus practice of nursing skills related to supportive and/or therapeutic care during the maternity cycle.

PHYSIOLOGICAL SCIENCE 4 — Psychopathology

The study of human emotional development and the meaning and causes of behavior as they relate to the emotionally-disturbed individual; causes of mental illness; and the detection, prevention, and treatment of emotional and mental illness in the hospital and community.

NURSING IV

The planning and administering of psychiatric nursing care including the further development of skills related to observation and communication. Experience with individual patients and as a member of a therapeutic team.

THESIS — Nursing Care Study

Detailed description of an individual patient and his nursing care.

PHYSIOLOGICAL SCIENCE 5

Study of the relationship of micro-organisms to disease, immunity and immunity reactions; specific disease processes common to adults and children; pathogenesis, signs and symptoms, methods of diagnosis, and principles of therapy. Therapy will include pharmacology and diet therapy.

NURSING V

Experience in planning nursing care in relation to different age groups and in the development of proficiency in the performance of nursing techniques.

COMMUNITY HEALTH

(a) Study of concepts of health and provisions for health care in historical and contemporary societies.
(b) Study of the development, contemporary issues and future trends of nursing service and education.

PHYSIOLOGICAL SCIENCE 6

Detailed study of disease processes and therapeutic measures.

NURSING VI

(a) Experience in caring for the patient with a long-term illness.
(b) Experience in functioning as a member of the ward staff including carrying a full patient assignment, performing special duties, acting as a team leader.

Admission

Admission to the revised program remained the same until the Regulations under the Nurses' Act were changed to permit schools of nursing to admit graduates from the four-year high school programs. At this time Ryerson admitted students with a 70% average from the four-year stream while continuing to demand a 60% average for students graduating from the fourth year of the five-year stream. This is in excess of the minimum admission requirements as set by the Nurses' Act. Mature students have always been admitted to the program provided they met the requirements as set by the Nurses' Act.

Other programs in the Institute which require a similar admission standard are: Architectural Technology; Business Administration courses; Secretarial Science; Photographic Arts; Home Economics. Programs such as Interior Design; Journalism; Radio and Television Arts, require the Ontario Secondary School Honour Graduation Diploma (i.e. Senior Matriculation)

Cost

The cost of the Program to the student has increased from 1964 to 1969 as fees, uniforms, books, etc. have increased with the cost of living. The costs given below are for 1969.

Fees	$967.00	
Uniforms	60.00	
Immunization		(depends upon resource used)
Private physician	?	
Dept. of Health	free	
Ryerson Clinic	free	
Laboratory fees	—	
Books, instruments, etc.	250.00-260.00	
TOTAL COST	$1,300.00	(approximate)

It has been estimated that room and board and incidental living costs plus the above costs will approximate $4,000.00 for the total program.

Attendance

Attendance requirements at the Institute differ from those in traditional nursing programs. In 1964, throughout the Institute including the Nursing Program, an attendance requirement was enforced for the first year student but was not enforced for the second or third year student. The attendance requirement for the first year was that the student might be absent from lectures, laboratory (including clinical experience) for 15 per cent of the scheduled hours exclusive of medical exemptions.

Also in 1964 the Institute had dress regulations. Although these were stated for men only, and included white shirt and tie, and business suits or dark blazer and grey slacks, it was assumed that women were not permitted to wear slacks or other extreme non-businesslike attire. Over the years the dress regulations and the attendance regulations were relaxed to the point that by 1969 no regulation was stated in the Calendar. Individual departments are permitted to set their own standards, although, in fact, few have. The Nursing Department has an attendance and dress regulation for clinical practice only. The attendance regulation related to clinical practice is identical to the former 15 per cent for first year students, however, it extends through the six semesters. The dress regulation demands that students be in complete uniform while assigned to units for the purpose of giving patient care unless this is not appropriate to the unit concerned, e.g. psychiatric units.

Curriculum Change

The next major curriculum change occurred in September 1969 when the Nursing Department became one of the five Departments at Ryerson which converted to the Institute's new academic policy. The contrasting features between the old and the new academic system at the Institute are:

1. Under the old system the student was required to take a set block of courses in each year or semester. The only exception to taking the total block was that the student could obtain exemption for a maximum of two courses for which he had obtained a second-class standing or better at some previous time. Under the new system the student may take any number of courses that he wishes. This encourages part-time students, and also allows students to obtain credit for work done at other institutions, as well as at Ryerson. An outcome of this change in approach is that students now receive individual timetables geared to their individual course mix.

2. Under the old system the maximum credit that a student could obtain for work done outside the Institute was two semesters. Under the new system the student must complete a minimum of two semesters of full-time study at Ryerson in order to qualify for a Ryerson diploma. This change in approach encourages students to transfer from other institutions to Ryerson.

3. Under the old system the student was promoted on the basis of an overall average for all courses taken in the semester or year. This meant that if the student failed to obtain the required overall average he had to repeat all courses whether passed or failed. Under the new system the student is promoted by course, that is, if a student passes a course he does not have to repeat that course.

4. Under the old system it was possible but difficult for departments to introduce electives in programs. The new system encourages the offering of electives.

To date the Diploma Nursing Program does not include electives.

This chapter has identified some of the events preceding the establishment of the Ryerson nursing program, and, in addition, outlines the curriculum and some aspects of the program between the years 1964-69.

Footnotes

1. A. R. Lord, *Report of the Evaluation of the Metropolitan School of Nursing Windsor,* Ontario (Canadian Nurses Association, 1952).

2. *Ibid.*, p. 54
3. Mildred L. Montag, *The Education of Nursing Technicians* (New York): G. P. Putnam, 1951).
4. Mildred L. Montag, *Community College Education for Nursing: An Experiment in Technical Education for Nursing* with Part 2 by Lassar Gothey, Research Assistant (Toronto: McGraw-Hill, 1959).
5. Bernice E. Anderson, *Nursing Education in Community Junior Colleges*, (Philadelphia: Lippincott Co., 1966).
6. Dorothy Rowles, *Report of the "Ryerson Project"*, (Registered Nurses' Association of Ontario, 1963), p. 4.
7. *Ibid.*, p. 4
8. *Ibid.*
9. *Ibid.*, Appendix 2, p. iv.
10. *Ibid.*, pp. 32-34.
11. Written communication from Miss R. Klaiman and Miss D. Rowles, January 1971.
12. From the calendar of Ryerson Polytechnical Institute, 1969, pp. 181-182.

PART I

INTRODUCTION — DESCRIPTION OF THE SYSTEM

CHAPTER 3

THE NURSING PROGRAM AT RYERSON

CRITICAL ISSUES

THE RYERSON Polytechnical Institute started out originally as a normal school. During the War, it became a centre for the Air Force, and later branched into training for returning veterans. It was this development which prefaced its gradual evolution into an institute providing post-secondary preparation in technology. Owing to experience in educating technologists over the years, Ryerson now views itself as unique and increasingly expert in this respect in Canada.

In discussing the function of the Institute and its future path, one senior faculty member described the differences between the technician, the technologist and the professional. He said that the technician was some one who had Grade 12 and an apprenticeship training of two years, whereas the technologist also had Grade 12, but three or four years of further education. He described the technician as someone who works under direction and carries out assignments, whereas the technologist takes initiative, studies, assesses and tests out procedures and methods, and makes recommendations. The technologist works on his own because he has a background of theory and a high degree of skill in applying it in the practical situation. He spoke of the professional as having a much broader background in theory and knowledge to bring to bear in practice, but that he was involved less actively in applying this knowledge in the field.

In the rapidly changing educational picture of today a number of alternate directions are open to Ryerson. Its future has yet to be clarified: Will Ryerson become the centre for graduate education in technology like the Massachusetts Institute of Technology or will it become a special type of college of Arts and Technology?

Prior to 1964, in preparation for the nursing program at Ryerson, much discussion took place between the Registered Nurses' Association of Ontario, Miss Dorothy Rowles — the author of the report outling a proposed program in nursing at Ryerson, and the Principal and others at the Institute. The initial philosophy for all concerned appears to have been to develop the nursing program within the existing policies and structures of Ryerson as they then existed. The only policy requiring modification was the instructor-student ratio, which was one to thirty at that time in Ryerson. A number of hospitals without schools of nursing in Metropolitan Toronto had already expressed interest in providing clinical facilities for student experience. It seems that the issue of clinical fields for student experience was discussed among the parties, however, no record of consensus or commitment is available. The nursing program began in September 1964 on a trial basis for five years, with Miss Dorothy Rowles as the first Director.

One instructor was hired, — Miss Carol Attridge, and in September 1964 twenty-one students were admitted to the new nursing program. As the nursing program had no logical home in the Ryerson administrative structure, the course director in the position of Instructural Supervisor reported directly to the Principal. The position of Instructional Supervisor was classified as an instructor with supervisory duties and $400 per year were added to the instructor's salary. As an Instructional Supervisor did not usually perform administrative functions, these aspects were carried out by the Course Director in an informal manner. Being involved in administrative concerns, the Instructional Supervisor dealt directly with the Registrar re policies and practices for admission; undertook to interview and to hire new staff; and recommended staff for promotion and instructors for tenure. Although arrangements and letters of intention concerning the nursing program and its external relations with hospitals and agencies were made by the Course Director, the letters were usually signed by someone in the administrative line. The method open to faculty of the nursing program to voice opinions and to influence policy directly lay in membership in the Faculty Association of Ryerson.

The first Principal of Ryerson Polytechnical Institute retired in 1966, however, he graciously consented to describe during an interview in 1968 the problems which he felt Ryerson had encountered with the new nursing course. The following paragraphs attempt to recapture in the words of the past principal the major ideas which evolved during this discussion.

IN THE BEGINNING

> Our little program there, it had so many difficulties. It really was not a good idea, but it was the only place to start it. I certainly did not anticipate all the problems, I thought it would be a simple matter. I was not in agreement with it when approached by the Registered Nurses' Association of Ontario, but it was experimental in the sense that it would show up all the problems, — and that it did. The problems which confronted us began right at the beginning.

These problems are described under the headings of Clinical Fields, Teaching Staff, and Recruitment.

CLINICAL FIELDS

> Ryerson was in the centre of the city and all the hospitals had their own schools of nursing. They required the space for their students and were unable to take ours. I talked with the administrators, but they said that they already had their school. However, I felt, although I could see their point, that Ryerson's approach was the way to educate nurses. They replied by saying that nurses should really be prepared in hospital schools and they felt that there was not enough practical work in the Ryerson program. So we had to bus the students to outlying hospitals. This took a great deal of time and really there was not much time left for students to obtain experience in the hospital.

TEACHING STAFF

> The outlying hospitals did not have their own schools and therefore there were no instructors to teach students in the practical area; this meant that Ryerson had to hire teachers to go with them into the clinical field. This practice increased the expense of the course because in the clinical situation, a ratio of one to six seems to be required. I had assumed in the beginning that the nursing instructors would teach the theory in the classroom at Ryerson to a large number of students and then the practical teaching would be done by the staff of the hospital school. The problem was handled so that nurse instructors in the field received less salary, but the Teachers' Association felt that as they belonged to the Ryerson staff they should receive a teacher's salary given that they were qualified in this respect. Other faculty asked whether teachers should receive as much for teaching six students as thirty, and so the problem grew.

RECRUITMENT

> The third problem related to students' fees and it meant that recruitment was selective for those families who could afford the fees and for this reason, enrolment was small. Students could go to hospital schools without paying. The program did not grow and it was expensive given the number of instructors and the low enrolment.

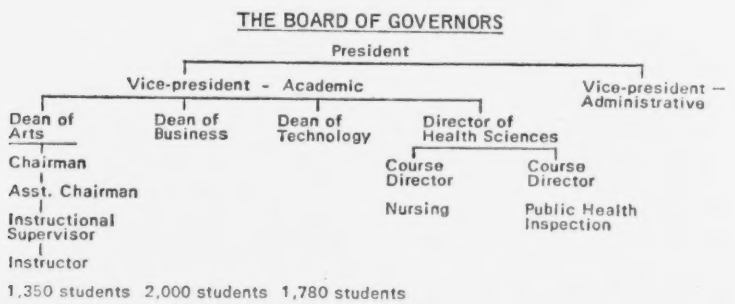
These comments illustrate some of the difficulties in establishing a new program or gaining support for a new idea within an institution which has a well-established set of interests and priorities. Critical issues and viewpoints which have great meaning or import for the innovating group are rarely perceived in this light by others and frequently their understanding and assistance is necessary to the successful accomplishment of the experiment. It takes time to understand the features which differentiate a new program from those already in existence in the institution, i.e. nursing from other technologies at Ryerson, and to differentiate a new type of program from established ones, i.e. the Ryerson nursing course from the hospital nursing program. At Ryerson the Institute was committed to procedures and policies, some of which were difficult to apply to the nursing program; the hospitals as potential contributors of clinical facilities were also committed to their own traditional nursing programs which from their viewpoint seemed an effective socializing agent for hospital employment.

In the fall of 1965 a Department of Health Sciences was organized at Ryerson and the nursing program gained a spokesman in the person of the Medical Officer of the Institute health services who was appointed to the position of Chairman of the Department. At that time the economic problem arising out of the higher ratio of instructors to students in the nursing program as compared with other Ryerson courses became increasingly evident. A solution was reached which identified the persons primarily responsible for the conduct of the nursing program as Instructors and those who worked more with students in the clinical field as Clinical Supervisors. This arrangement permitted a lower salary scale for those who guided students in their clinical practice. As a result under the new arrangement of positions, Clinical Supervisors, who constituted a major portion of the nursing staff, were unable to join the Ryerson Faculty Association as instructor status was a condition for membership. Through the efforts of the Faculty Association, the problem became more visible and in the fall of 1966, under a new President and with the agreement of the Board of Governors, the status of Clinical

Supervisor in the nursing program was changed to that of Instructor. At this time the position of Clinical Demonstrator was introduced. This position involved a more limited function than that of instructor, requiring less preparation and experience and therefore less pay. Toward the end of 1966, the faculty of the nursing program included the Instructional Supervisor, seven instructors, and one clinical demonstrator.[1]

Even though a number of hospitals indicated interest in providing clinical facilities for the Ryerson students, their procurement has continued to present a problem to faculty. The changing picture of the hospital's multi-commitments for clinical facilities to various groups is nothing short of chaotic. There appears to be no firm basis for the granting of clinical facilities, therefore the influential factors in this play are difficult to ferret out. However, the problem is under study by a number of the groups concerned and it can only be hoped that criteria for the allocation of clinical facilities can be established. Although Ryerson faculty spoke of the efforts they made to know the nursing staff in the units which were used and to help them understand the program and the experiences required by students, it remains a difficult task when clinical facilities change or their availability decreases. In addition, the Ryerson faculty attempt to involve the students in the life of the ward and to have them learn to nurse with other nurses in the situation. To establish this type of relation among faculty, students, and nursing staff requires time and effort and the effectiveness for all groups is greatly diminished with uncertainty and upheaval brought about by changes in the use of clinical fields.

In May 1967 an administrative restructuring into divisions was introduced at Ryerson, — Arts, Business, and Technology, each with a Dean, and Health Sciences, with a Director. In 1967 a picture of the organization might be portrayed as follows:



The Director of Health Sciences described his position to us in an interview as that of watchdog and checker with respect to the programs under him; he saw that the standards of the institution were maintained and generally acted in a coordinating capacity for his programs. He met with the Deans of the Divisions, — Arts, Business, and Technology with respect to operating policies and personnel problems. The notion which he conveyed was that the Course Director of the Nursing Program was responsible for all aspects of that course.

Both of the initial placements of the Nursing Program could have isolated it from the remainder of the Institute. In the first place, the program was treated as a special case in that it was organized outside the structure incorporating other programs. Later it was located in Health Sciences, an entity which had not yet achieved division status. In addition, the Nursing Program, according to the President of Ryerson and the Director of Health Sciences, was "left on its own" to conduct its own program and affairs. Undoubtedly these beliefs attest to the Administration's confidence in the Nursing Faculty; however, many a nursing department has stagnated and failed owing to the isolation which accompanies the notion that the discipline or profession of nursing is unique from all other areas of study in an educational institution. A major purpose of locating nursing programs in educational institutions is to bring the faculty into close touch with other faculties on all matters of curriculum, faculty and students and to participate as full members in the workings of the whole institution. Possibly we press for autonomy in new situations along dimensions inappropriate to the development of our own programs and faculty.

Despite the structural problems inherent in the development of the Ryerson Nursing Program the faculty did not appear to suffer deprivation. The faculty of the Nursing Program from the beginning were active in the Faculty Association and on the various committees and endeavors of the Institute, — in all types of problems and at all levels of decision-making. Possibly their initial problem relating to the classification of instructors in the Nursing Program and the ensuing debate and resolution made the program and its faculty highly visible to the other members of the Institute. Information obtained early in this project provides some indication of the less formal relations of the Nursing Faculty with those from other departments. The Nursing Faculty were acquainted with faculty in sixteen departments ranging from Chemical Engineering to Photographic Arts to Journalism. In describing the content of their conversation with other faculty, 54 per cent

was of a social or general nature and the remainder, work and education. All five of the initial Nursing Faculty had described how nursing was taught at many official meetings and informally on numerous occasions, — three from ten to twenty-five times, and two from two to four times. In a variety of ways the Nursing Faculty have become known and the opportunity exists for them to influence and to be influenced by the whole institution. In 1969 Nursing was granted the status of a department and the position of Course Director became that of Chairman. With the appointment to Chairman, the functions of the head of the Nursing Program came legitimately to include administration of that department, — budgeting, hiring and firing, evaluation, assessment of professional competence, and so on.

A strong commitment to the Nursing Program at Ryerson was noted early in 1969 in discussion with the second President* of Ryerson to hold office during the period of the evaluation study. He expressed the belief that nursing programs along with preparatory programs in many other fields, should be located in an educational institution. He agreed with the Director of Health Sciences that the Chairman of the Nursing Department should in all respects administer and control that department, subject only to the overall policies and procedures of the institution. The President indicated that the progress of the Nursing Program depended on its growth and effectiveness in the community. He speculated on the future of Ryerson indicating that the present student body of 5,000 would increase and that eventually four-year courses would develop, possibly leading to degrees. He saw Ryerson as unique vis-à-vis the functions and purposes of universities as well as of the colleges of Applied Arts and Technology. He did not believe that there was any undue pressure to conform to either of these patterns and therefore felt that nursing education was situated in flexible surroundings at Ryerson, offering it scope for development.

Questions relating to the cost of the Nursing Program were posed both to the President and later to the Director of Finance. At the time of publication, real costs which one might use with confidence for purposes of comparison across programs are not available. However, the President expressed in 1969 that the problem of numbers of teachers and demonstrators had been settled and that Ryerson was willing to pay for more instructors per student in nursing than in other programs. Although precise costs were not available, he seemed to feel that most courses are costly in one way or another, supplies, equipment, personnel, etc.

* The position of principal was changed to that of president in 1967.

Each person in an administrative position spoke frequently of the salient nature of Ryerson programs and their merit as responses to direct community needs. For this reason each program has an advisory committee composed of interested community members who are able to articulate the particular needs in that field. In the earlier years of the Nursing Program the Advisory Committee acted as an information receiving centre to find out about new developments in the program and to be kept up to date on specific matters. Later the Advisory Committee began to study programs proposed by the Nursing Department relating their relevance and appropriateness to nursing service needs both in hospital and in other community agencies. Secondly, Ryerson Faculty were provided with the opportunity to discuss problems and to test out their ideas with individual members of the Committee, according to their expertise. Now Advisory Committee meetings are called directly by the Chairman of the Nursing Department.

In 1966-67, owing to problems of recruitment and difficulties in obtaining clinical facilities and as a response to the expression of need in service agencies for persons prepared with a high level of skill in specific clinical areas, the Ryerson faculty began to think seriously of post-graduate courses for diploma graduates. In view of the increasing number of colleges of Applied Arts and Technology, Ryerson was at this time searching for its own unique function in the rapidly changing educational picture of Ontario. Capitalizing on past experience in the preparation of technologists, it seemed reasonable to consider Ryerson as a possible centre for post-graduate education in technological fields. Convinced of the desirability and feasibility of this plan for nursing, the Ryerson faculty acted and offered a one-semester program in Psychiatric Nursing in the Fall Semester of 1968, one in Pediatric Nursing in September 1969, and in Intensive Care Nursing in January 1970. These programs combined related courses from general Arts and Sciences with clinically-based nursing courses directed and supervised by Ryerson nursing faculty. This innovation in nursing education is probably the first of its kind in either the United States or Canada. Whether it will become a pattern for post-graduate preparation for the diploma graduate remains to be seen, however, other college-based nursing courses are already considering and planning for similar types of programs. Already this tentative plan to concentrate on post-graduate courses for the diploma graduate is becoming obsolete at Ryerson in view of foreseeable changes in the future. With the general move to relocate nursing education programs at the diploma level within the Colleges of Applied Arts and Tech-

nology, Ryerson may well be called upon to act in this capacity in the central Toronto area. If so, the enrolment figures could increase drastically in the diploma course.

In 1970, Miss Rowles, the Chairman of the Nursing Department was appointed to the position of Executive Assistant to the Vice-President — Academic. Later in the year, a new Chairman was appointed to the Nursing Department and as of January 1, 1971, the Executive Assistant to the Vice-President — Academic has, in addition, been appointed to the position of Acting Dean of the Division of Community Services, the renamed Health Sciences Section. The major divisions at Ryerson are now Arts, Applied Arts, Technology, Business and Community Services. Community Services includes Nursing, Social Service, Public Health Inspection and Physical Education. The former Dean of Community Services relinquished this position to return on a full-time basis to the Institute health services.

In the present organizational set-up in the Division of Community Services, the Nursing Department may be portrayed as follows:

DEAN — DIVISION OF COMMUNITY SERVICES

CHAIRMAN — NURSING DEPARTMENT

Program Director	Instructor Supervisor	Instructors — 12
Diploma	Post-Diploma	Demonstrator — 1
Program	Programs	

An instructor is said to have a teaching load of 28 hours, four clinical days of 7 hours each. The Program Director of the diploma program has a 14-hour teaching load, the remainder of the time being spent on curriculum development, advisement of students, orientation of new staff, records and general administration. The ratio of instructors to students in the diplom program is 1 : 8. Of the three persons teaching in the post-diploma programs, one is elected to the position of Instructor Supervisor. The ratio of instructors to students in the post-diploma programs is 1:15. Most instructors seem to agree that the problem of decreasing the cost of the nursing program does not lie in an increase of persons in the demonstrator position. Most suggest that newer teaching methods may eventually change the teaching of nursing, but any major work on such methods must be carried out by persons other than those working full-time in a teaching program. In the meantime considerable modification is being

effected in the multi-purpose laboratory for the teaching of nursing at Ryerson through the development of content for use via multi-purpose media.

Information on the admissions to and the graduates from the diploma nursing program at Ryerson is as follows:[2]

Date	*Admissions*	*Graduates*
1964-65	21	—
1965-66	37	—
1966-67	43	9
1967-68	41	25
1968-69	37	54
1969-70	39	21
1970-71	72	—

It is noteable in these figures that a high attrition rate characterizes admissions to the diploma nursing program, however it is too early in the life of the program to seek to understand this problem. The Ryerson nursing program is relatively new and it has not yet attained a reputation which undoubtedly acts in other cases to draw some into the program and to keep others out; that is reputation assists in self-selection.

Throughout this study problems in the teaching of nursing in a new type of program such as Ryerson have been mentioned by faculty, by nursing staff in cooperating agencies, and by nurses in the employment situation. A number of these problems were posed to the Chairman of the Nursing Department to obtain her assessment of the problem and the response of the Nursing Faculty to it.[3] Questions and answers follow:

1. How do you provide for continuity of care when the student is only in the clinical field two days per week?

> Nurses do not really provide continuity in the everyday situation as they seldom are assigned to the same group of patients over time. In the learning situation sometimes continuity is required and other times it is not; that is frequently the student can accomplish the purposes of the experience within the two-day period. Where continuity is required over time, patient situations are provided in which the student can look after the same group of patients for a six-week period. In

other types of situations a group of students nurse a group of patients over time and each student assumes responsibility to communicate with succeeding students.

2. How do students learn to nurse patients on shifts other than the day shift?

Actually the paucity of clinical experience dictates that a good deal of the teaching of nursing be carried out on the afternoon or evening shift. Although no actual experience at night is required, sometimes options are provided for individual students.

3. Despite the effectiveness of the Ryerson graduate in the nursing situation, the problem of lack of confidence appears in the Ryerson student and later in the Ryerson graduate, — what does this mean?

Actually they do not really lack confidence, they had a good background both in science and in nursing. However, they express their feelings readily, they are free to say how they feel in a situation, and they like to talk it over with their instructor or supervisor. Now that Ryerson students are meeting students in other types of two-year programs where more students receive experience on a one, two or three day per week basis, we note quite a difference. Our students feel they have more experience than some of these other students. As far as the work situation, many of our graduates are eager to take on senior jobs very quickly; they are scared but they are proud of it and they talk about it and they do it.

4. How do you cope with the absence of students from the clinical field?

Students are permitted to be away 15 per cent of the time, that is three days per semester. If a student is away more than the allotted time she should not be able to pass the exam. Therefore if she is away she has to catch up and this requires that she take the responsibility. If students are absent from the clinical field due to illness, the instructors help her to make up the experiences she has missed. As far as the staffing of the unit is concerned, when the students are absent early in the program, it doesn't affect the provision of nursing service to any great extent. The students notify the ward and, if by any chance, it creates a problem in the ward, the remainder of the students assist in the general nursing care to remedy the situation. Often if a student returns following an absence of two or more days she is unable to fit in immediately and there-

fore is assigned duties in the ward such as messenger or other type of activities which could be carried out by anyone on a temporary basis. Students are graded on their clinical practice and they are eager to demonstrate satisfactory performance. In addition the staff nurses in the unit exert a considerable amount of control on student absences from the ward because there is a good deal of association between the staff and the students; the staff take care of many of these kinds of problems.

To obtain views on the performance of the students other than in nursing courses, interviews were held with some faculty in Sociology and Psychology and written information was obtained from faculty in a number of the non-nursing courses.

In discussion with faculty in the Social Science Department, it was established that the introductory courses in Sociology and Psychology are the general courses presented to provide an overview of the field and as an approach to the subject. Further courses in these fields are usually developed on demand by other departments and are directed toward specific objectives worked out by the department in question along with the sociologist or the psychologist. Evidently these courses in Sociology and Psychology are attended by specific groups of students, nurses, secretarial science, social service, and so on. One teacher of Sociology felt that it was better not to mix students for she said that to break up basic prejudices it was better not to have too many different ideas but to have a homogeneous group where people were more comfortable with each other. Another person from Sociology believed it would be a good idea to have students of various fields studying together, however he stated that this was not the practice at Ryerson.

One instructor in Sociology characterized the first class of nursing students she taught as exceptional, — interesting people, animated and participated readily; whereas the second group were less outstanding although they were still receptive and productive. She described nursing students in the following fashion: bright as other students; better organized and disciplined; not complainers; standard attitudes of beginning students to Sociology; well-adjusted group, seem willing to look at their ideas and to recognize prejudices in themselves; less shocked by the content of Sociology and changes in themselves, more balanced. This instructor felt that because the nursing students were interested in people that Sociology actually reinforced that basic motivation which was the idea underlying their

choice of nursing. She said that if the students had been breaking people up into little bits, i.e. in Physiology or through technical procedures, that fundamentally these students did not like this and so took readily to social science. The instructor in Psychology noted that the nursing students were interested to learn something new, but not necessarily interested because they could apply it in their field. Other students, for example in Business, were interested in learning something if it was applicable in their field.

Some of the written comments from instructors who teach social sciences are presented below:

> I taught sociology to one class of nursing students during their 3rd and 4th semesters. From talking with other staff members, I am willing to conclude that this was an exceptional class — very bright, motivated and affable. Their grades were above average of the 4 classes (sociology) I taught that year, their class average (69.7%) was second highest.
>
> I found that the girls were very receptive to the subject matter of sociology. Obviously people choosing the nursing profession are interested in people, and they enjoyed this theoretical approach to society and behaviour. They seemed to find it supplemented their other courses well, and they enjoyed the change of pace from their other clinical studies. I also taught one class of nurses during the summer semester, and found them much less animated, although they too were quite receptive to the subject matter and perspective of sociology. I don't know if their relative lack of animation was due to the personalities involved or due to the retarded pace of the summer semester. But in general, they enjoyed the subject, and their performance was above the Ryerson average.
>
> I taught three groups (two groups of first year students and one group of registered nurses specializing for Psychiatric Nursing).
>
> I find it difficult to give any concrete opinion because my judgement is based on only one year's teaching experience to nurses.
>
> Of the two first year groups I taught one of them I found was highly motivated and as a group better in performance than other groups of welfare students and secretarial science students I was teaching that year.
>
> One other group was about average in performance. Compared

to the present group of Business students I would say these students (Business) are much higher in intellectual potential than nurses.
So I conclude they are average in performance compared to other students.

I taught Politics to the Nursing students during the summer of 1968. The curriculum placed an accent on Political Thought (from Plato to Hitler) but Public Affairs (particularly the Federal election of 1968) were discussed at length.
I found the class of Nursing students a very conscientious one. The unfamiliarity of a number of students with some political thinkers was quickly overcome. The performance of the Nursing class was just as good as any other class I have had at Ryerson.
I would say that the nurses are approximately at the same level as the secretarial science and business students that I teach.

These comments from the instructors seem to reflect the fit of the nursing students into the Ryerson milieu; they do reasonably well, neither genius nor failure.

This section has attempted to describe the growth of the Ryerson Nursing Program and to identify some of the problems, as well as the strengths and potentials of this department.

Footnotes

1. The function of this position is to assist with the supervision of procedural aspects of nursing. Through the life of this study, one person has held the job of clinical demonstrator. To develop this role as separate from that of nursing instructor is not simple. Once the job has been performed by a number of persons and carried out in a variety of clinical fields, there will be more evidence to sustain a description of this position, its values and problems.
2. Written communication from Chairman of the Nursing Department, Ryerson Polytechnical Institute, February 8, 1971.
3. In discussion with the Chairman of the Nursing Department, Ryerson Polytechnical Institute, January 1971.

PART II

THE STUDENT IN THE SYSTEM

CHAPTER 4

THE NURSING RECRUIT

What is the social and ethnic background of students recruited to the various schools of nursing? What influences seem to direct a student toward a career in nursing? When and how do students choose to become nurses and to enrol in particular schools of nursing? What is the self-image of these students? What characteristics do they believe are inherent in the nursing profession? What are their expectations of life as a student nurse? What type of position and remuneration do they expect to be able to obtain on graduating from nursing?

Students are recruited to a school of nursing; they participate in multiple experiences, planned and unplanned; they graduate as young professionals. While the relationships and experiences of school life help determine the kind of professional they will become, the effectiveness of new stimuli is dependent in great part on previously developed responses and attitudes. It would seem, therefore, that when a "new" school of nursing (in this case, one in an educational setting) comes under scrutiny, not only should the influences of life as a student be weighed, but perspective should be maintained by understanding something of what the students are when they first come to a school of nursing.[1]

A set of instruments was prepared to collect such data from the students. These "student" instruments were administered not only to the students from Ryerson, but also to those from Schools A, B and C.[2] A summary of the questions asked and the findings obtained through these instruments is presented in chronological order (i.e. the chronology of a student nurse's life). Here in Chapter 4 the material is presented relating to the background, attitudes and expectations of the nursing recruit; Chapter 5 concentrates on the activities and experiences of life as a student; and Chapter 6 discusses the graduating student as she is about to enter the work-world.

Soon after registering, students from the four schools of nursing completed three questionnaires. The first, the *Introductory Information Questionnaire,*[3] was constructed to collect data on the student's background — socio-economic and ethnic, on the influences bearing on the student's career choice by her extended family and pre-nursing peer groups, and on the actual process of choosing nursing as a career. The next, the *Nursing Selection Inventory,* which was composed of two parts: A. *Self-Image Characteristics Scale* and B. *Nursing Profession Characteristics Scale,*[4] asks the questions: What do the respondents think of themselves? and, What do they think of the nursing profession? The third and final instrument completed by the respondents at the beginning of their nursing program was the *Expectations and Experiences in Nursing Questionnaire.*[5] Part A, *Expections as a Student Nurse,* asked the respondents which aspects of life as a student they anticipated positively and which negatively. Part B, *Expectations Following Graduation,* concerns the amount of participation in the nursing profession expected by the respondents during their normal working life, what positions they expected to be able to obtain, and the level of salary they associated with these positions.

The compilation and integration of the data collected through these instruments allows comparison and contrast between the students recruited to the various types of nursing programs which participated in this study: a program in an educational setting, an independent school and two hospital-based schools of nursing.

1. *Introductory Information Questionnaire*

A. The student's background — Socio-economic and Ethnic

A series of questions was asked relating to the respondents' ethnic backgrounds and mother tongue. *The students were first asked their birth-place and that of their father and mother.* Approximately 60-90 per cent of the students and 50-80 per cent of their parents were born in Canada. However, significantly[6] fewer fathers of Ryerson students, as compared with those of all other respondents, and significantly fewer of their mothers, as compared with those of hospital-based respondents, were born in Canada. Further, while English is spoken predominantly in the homes of all respondents (mean over 80%), significantly fewer Ryerson students speak English as the only language in the home, and a fair number (12%) communicate with their parents solely in a European or Eastern language.[7]

In order to understand better the socio-economic backgrounds of the respondents, information was collected on their fathers' occupa-

tions, whether or not their mothers worked, the educational level of their parents, and the anticipated educational levels of both the respondents themselves and their siblings. Responses, from the question: *What is your father's occupation?* showed, on the whole, little variation. However, while the categories such as "self-employed" or "skilled worker worker or technician" do not serve to discriminate between the various groups of respondents, the category "professional or executive", does. Significantly more fathers of School A students, as compared with the three other groups, are professionals or executives. However, there is a significantly higher per cent of Ryerson respondents with fathers who are deceased.

The students were next asked: *Does your mother work? How much does she work? What is her occupation?* The mothers of respondents from Schools A[8] and C (approximately 40%) work less than those of Ryerson and School B (approximately 50%). However, not only do more of the mothers of Ryerson respondents work, but of those who do, almost three times as many work full-time as part-time (while with Schools B and C mothers, less than twice as many work full-time as part-time, and as School A, more mothers work only part-time). Further, while there is little variation in the pattern of occupations of working mothers, most being employed in banks or offices there is a slightly higher per cent of Ryerson mothers who are nurses (range: 5.7% from School B to 16.7% from Ryerson). There does seem to be an unusually low proportion of teachers (mean: 1.4%) among these nursing students' mothers, considering that teachinng is a common occupation for women.

On asking the question of the respondents: *What level of education (primary school, high school, etc.) have your parents completed?*, it was found that well over 80 per cent of all parents had completed at least high school. On the one hand, School A has the highest per cent of students who have fathers with any form of post-high school education (55%) and specifically with university degrees (38%), as as well as having the highest per cent with mothers who have completed university (10%). On the other hand, Ryerson has the largest number of students with fathers who attended technical or vocational college (21%), as well as the highest per cent of mothers who have any form of post-high school education (50%). Generally, the pattern is similar at the two hospital-based schools of nursing, where the respondents report the least parental education, and somewhat similar at School A and Ryerson, where the respondents report the most parental education though School A reports more, specifically at a university and Ryerson, at a technical or vocational college).

The expected educational level of respondents' siblings tends only somewhat to parallel their parents' pattern. For, while university education is anticipated for more of the siblings of School A students, the mean per cent of technical or other vocational college education anticipated is similar across the four schools. However, the number of respondents' brothers and sisters who are interested in such education is greatest at School C and least at Ryerson. Of those respondents having siblings, approximately 60-80 per cent of them expect to go on to post-high school education; (School A: 81%; School B: 68%; Ryerson: 67%; School C: 60%), with the ratio of expected university to vocational or technical college education varying from school to school. While at Ryerson and School A, almost twice as many of these siblings expect to go to university as to a "college", the proportion is about "half and half" at Schools B and C.

What of the educational expectations of the respondents themselves? The patterns of personal educational aspirations are consistent with neither parental patterns nor sibling expectations, and they vary distinctly from school to school. First, a high of 40 per cent of School C students, but a low of 5 per cent of School A students expect to complete only their nursing course. Significantly more students from School C, as compared with the three others groups, expect to terminate their education at the level of a basic nursing course. At the other end of the spectrum, while more students from School A anticipate some form of post-nursing education such as university or specialty courses (School A: 89%; Ryerson: 82%; School B: 72%; School C: 53%), more students from Ryerson specifically expect to obtain a university degree (Ryerson: 58%; School A: 51%; School B: 35%; School C: 18%). This per cent of Ryerson students is significantly higher than the per cents from Schools B and C; and, of this 58 per cent of Ryerson respondents, 17 per cent hope to go on to graduate work at the university. Considering the educational achievements of their parents and that expected of their brothers and sisters, the Ryerson students tend to be more ambitious for themselves than are students from the three other schools.

B. The Influence of Family, Pre-Nursing Peer Groups and Community

In the second part of the *Introductory Information Questionnaire* questions were asked concerning the respondents' relationships with family and pre-nursing peer groups. What attitudes toward nursing did the respondents encounter? What pressures were exerted upon them by family and the community in their choice of nursing as a career?

The responses to the question, *What type of work or further education was undertaken by your three best friends following graduation from high school?* seem to indicate that the respondents, on the whole did not "move with the crowd" in choosing to become a nurse. While 32 per cent (School C) to 54 per cent (School A) of the respondents' closest friends went to university, only 16 per cent (School A) to 25 per cent (School C) of these friends came into nursing. Another 7 per cent (Ryerson) to 25 per cent (School C)[9] enrolled in various other programs at technical or vocational colleges. However, the only significant difference in the responses to this question lay in the per cent of close friends going to work immediately after high school. Here the figures for Ryerson (25%) were significantly higher than those from the three other groups.

Were the respondents influenced in their choice of a nursing career by medical or nursing personnel? In an attempt to answer this question, the respondents were first asked: *How many nurses or doctors do you have among your close friends or relatives?* The results were analyzed in terms of their having one, two or three nurses, and one, two or three doctors, as close friends or relatives. Over 80 per cent of all the students knew well, or were related to at least one nurse and over 30 per cent, one doctor. However, more Ryerson students knew nurses or doctors, or included them among their friends or relatives. Next in having medical or nursing acquaintances are the School A students, then School B students and lastly, those from School C. For all groups the per cent of nurses and doctors known are fairly evenly divided between the categories, friends and relatives.

While it is necessary that the respondents know these nurses and doctors in order to be influenced by them in their choice of a nursing career, acquaintance alone is not sufficient. *What actually was the attitude of these nurses and doctors toward a nursing career for the respondents?* And, in turn, how strongly did these attitudes influence the respondents? While there is little difference across the schools of nursing, there is a percentage decrease in the categories of responses from "favorable" (73-90%) through "unfavorable" (1-7%) attitudes toward a nursing career. The students from School A and Ryerson met with the most indifference or unfavorable attitudes toward their choice of nursing as a career (i.e. 15% at School A, 13% at Ryerson, as compared with 9% at School B and 6% at School C.) The respondents from School C were particularly encouraged in their career choice by the very high per cent of favorable attitudes they encountered (90%).

Did the respondents feel that the attitudes of their friends and relatives actually influenced them? The respondents generally reported that they "felt" more influence toward a nursing career than against it. They seemed to be influenced least by their siblings and most by their mothers, and then by friends and fathers. More specifically, over two-thirds of the hospital-based students reported that they were influenced toward a nursing career by their friends or relatives, as do almost as many of the students from School A. However, a significantly lower per cent (44%) of Ryerson students, as compared with those from Schools B and C, feel that they were influenced toward nursing as a career by any of their family or friends.

Could such influence toward a nursing career have come from persons in the community other than friends or relatives? Community influence against a nursing career is less than influence toward it; however, the amount of influence from the community, in general, is considerably and consistently less than that from friends and relatives. Approximately half of all respondents felt that the various individuals in the community, such as teachers, school nurses, guidance counsellors, etc., were quite indifferent to their choice of career. The highest proportion of influence toward nursing, for all groups, seemed to come from school nurses (37-63%) and family doctors (38-61%); the highest proportion against, from guidance counsellors (13%) for Ryerson respondents, but mainly from teachers (3-8%) for the others. However, just as they did from family and friends, Ryerson reported feeling the least pressure "toward" and the most pressure "against" nursing as a career from the various members of the community. It would seem that the Ryerson respondents (followed by those from School A) are given much less support than the respondent from the two hospital-based schools in their choice of nursing as a career.

C. The Process of Choosing the Means to a Nursing Career

The recruit to any profession must not only decide to enter the profession, but must also choose a specific school in which to learn the fundamentals of the profession. What pressures and motivations influenced the respondents as they committed themselves to a nursing career and selected one particular nursing program in which to learn to nurse?

When was nursing first considered, and how long after this was the decision to become a nurse finally made? The majority of students from Ryerson, School A and School B first considered nursing in high school. The students from School C differ significantly from

this pattern, as over 60 per cent of them seriously considered nursing while still in primary school. More than half of all respondents firmly committed themselves to this career at about the same time as they first considered it. However, 21 per cent of the Ryerson respondents, as compared with less than 10 percent of all other respondents, did not even think about nursing until they had finished high school. It would seem that the students from Ryerson consider nursing for a shorter time and choose nursing later than do the hospital-based students (particularly those from School C). The students from the autonomous school fall somewhere between the two; they consider and choose nursing later than do the hospital students, but earlier than do the students from Ryerson.

Once a person has decided on nursing, she must find a way to pursue this career. There are different types of nursing programs available to the average high school student. *Does the preferred type of nursing preparation vary in terms of the respondent's own view and as she perceives the views of her family, the nursing profession, the nursing faculty (of the education program which she finally chooses) and her home community?* From which is hers most divergent? A list of the five most common types of nursing preparation was presented for the respondents' consideration. A mean of 38 per cent of all respondents were unfamiliar with regional schools and 26 per cent did not know of nursing programs in technical or community colleges. The students from Schools A and C were least knowledgeable, with over 20 per cent being unfamiliar with various types of programs; while 14-15 per cent of Ryerson and School B respondents expressed such ignorance. The only significant difference in these findings lay in the contrast between the large number or respondents other than those from Ryerson, who did not know of nursing programs at schools such as Ryerson.

In rank order of familiarity were hospital programs, university schools, independent schools, technical or community college programs, and lastly regional schools. Unfamiliarity with some of these influences preference and limits the final choice of a nursing program. *How do the respondents rate the various type of nursing preparation? Which do they prefer?* On the whole, the respondents consider the type of preparation they have already chosen as the best way to become a nurse. Generally, either hospital or university school of nursing preparation is rated second. Further, there is little incogruency at School B and C, between the respondents' personal views and how they believe others (family, faculty, public and other nurses) rate various nursing preparations. These respondents have little doubt

that others believe, as they do, that the program at a hospital school is preferable to other modes of nursing education. Students from Ryerson and School A feel that the program they have chosen is best and that their faculty agrees with them, but they believe that their families, the general public and the nursing profession continue to view hospital schools as the preferred method of preparing nurses. The correlations between personal and projected views for Schools B and C are highest, ranging from .984-996. There are only correlations of about .80, however, between Ryerson students' views and their perceptions of public and professional attitudes toward nursing programs. Some incongruency between respondents' and faculty views can be explained by the fact that a small group of faculty from all schools are seen by the students as preferring university preparation. It would seem then that respondents from schools like Ryerson and School A choose their schools of nursing despite the views they believe other groups within the community hold; and, while they do experience favorable attitudes toward the type of preparation they have chosen, they have also felt, as compared with hospital-based students, greater consensus of feelings against it.

A fair number of respondents sensed that ways of becoming a nurse, other than the one they have selected, were preferred by the community at large. *Did the respondents consider these alternate types of preparation?* Did the respondents who felt the greatest incongruency between their views and the views of others give more thought to those views? There is no significant difference across the four schools of nursing in the number of respondents who considered alternate forms of preparation. A low of 12-33 per cent of all students considered regional schools while a high of 53-64 per cent were interested in university programs. Further, while only 13-18 per cent of the non-Ryerson students had considered a nursing program in a technical or community college, 64-80 per cent of the non-hospital-based students had looked into hospital programs. It would seem that community, family and professional pressure had the effect of making most students at least consider hospital preparation before making their final decision.

If many of the respondents did consider alternate forms of preparation for nursing, why did they reject these alternates? Significantly more Ryerson students, as compared with the other three groups of students, did *not* enrol in other programs because of "rules and regulations" (such as residence requirements), "too much clinical practice", and "the setting and atmosphere". Significantly fewer were influenced against programs by the "reputation of the school". On

comparing only hospital-based students and those from Ryerson, significantly more of the former rejected schools because of "higher academic standards", "not having the qualifications" and "the length of the programs". Finally, significantly more respondents from Ryerson and School A, than from Schools B and C, rejected programs that were too long.

It would seem that students from Ryerson saw restrictive or non-liberal factors such as rules and regulations and the setting and atmosphere of the institution as being factors for *not* choosing a school of nursing. Hospital and School A students rejected programs that did not have a good reputation, while the hospital students alone felt that they did not have the qualifications for certain programs (usually university schools). Finally, Ryerson and School A students did not want "long" programs.

While examining the types of nursing preparation rejected by the respondents is both interesting and informative, the process of actually choosing a specific school of nursing is perhaps even more rewarding. The respondents were asked: *When did you first learn of the institution housing your school of nursing? of the program itself? When did you choose to enrol in this specific program?* Significantly more Ryerson respondents learned of the existence of this institution after high school and many of these students did not simultaneously learn of the Ryerson nursing option. About two-thirds of respondents from Schools A, B and C learned of their nursing program and its setting while they were high school students. The remaining third from Schools B and C knew of their program and hospital from primary school. However, at School A, the remaining third, like the Ryerson students, obtained the information at a much later date — after they were high school graduates. Considering these significant differences, it can be concluded that the Ryerson student learned of and chose to enrol in the Ryerson nursing department well after the students from the other schools had chosen their specific programs. While the respondents from the autonomous school, A, are quite similar to the Ryerson students as to the time of decision-making those from the two hospital schools (particularly School C) not only considered and decided on a nursing career younger, but also learned of and selected their schools of nursing at an earlier stage of their lives.

What motivated the respondents finally to choose the school of nursing that they did? Do these reasons complement or contradict those given for rejecting alternate programs? The responses to this question of choice of program were mirror image to those concern-

ing rejection of alternate programs. Again the responses from School A were at times similar to those from Ryerson, but more often seemed like those from the two hospital-based schools of nursing. The reasons which were significantly more important to Ryerson students, than to the others, were "rules and regulations" (including residence requirements) and the brevity and liberal aspects of the Ryerson program. These respondents wanted freedom in their choice of living accommodations [10] and the intellectual challenge of a liberal academic program. Further, a small (but still significantly more than in the other three schools) group chose Ryerson because they applied too late for other programs.

A significantly higher per cent of students from Schools A, B and C noted other reasons as important in choosing their program: high academic standard,[11] extensive clinical facilities and the reputation of their school. Almost four times as many of the respondents in these schools as compared with Ryerson were strongly influenced by the clinical facilities utilized in the nursing programs they selected. The hospital-based students, and to a lesser extent those from School A, were concerned with their school's reputation for high academic and professional standards. These are the same students who felt the greatest community support in their choice of nursing as a career, and the least incongruency in terms of personal and projected preferences in types of nursing preparation.

While the patterns of influence toward nursing as a career were discussed earlier, the pressure involved in choosing a specific school of nursing bear examination at this point. *Were the respondents given advice concerning a school of nursing? Was it favorable or unfavorable, in view of their final choice? When it was unfavorable, what criticisms were presented?* Few of the respondents report receiving no advice (e.g. the per cent of respondents receiving no advice from parents: Ryerson: 38%; School A: 11%; School B: 12%; School C: 9%). However, in considering sources of advice, first from parents, then from siblings and friends, to the various groups within the community, such as teachers ,etc., the per cent of respondents being given advice declines. Ryerson students were given significantly less favorable advice and slightly more unfavorable advice about the school they were choosing. School A tended to be given the most advice that was "favorable but with limitations." The two hospital-based schools chosen for their reputation and tradition received the greatest support from family, friends and community.

While relatively few students were directly advised against their school of nursing, of those that were (i.e. from various sources,

0-13% at Ryerson, 0-8% at School A, 0-5% at School B and 0-4% at School C), significantly more Ryerson students were told not to study at Ryerson because of the cost. Ryerson and School A students differ significantly from the hospital students in the number that were advised to choose other programs because the school of their choice was not sufficiently recognized, or it did not provide enough practice. Significantly more School A students were told that their program was too short or that another type of program was preferred. Less than 14 per cent of the students were told that their program was too difficult or that it provided too much clinical practice.

The respondents have indicated that pressures were exerted by their friends, relatives and some members of the community in their choice of a nursing career and of a school of nursing. *Are these influences maintained after the respondents enter their schools of nursing? What living accommodations were obtained by the respondents at the various schools of nursing?* The Ryerson students, who seem to feel the greatest lack of congruency in influence toward a nursing career and choice of a school of nursing, show the greatest divergence in living accommodation. While most students continue to live at home (62%), some live with relatives, some share an apartment with other students, and a few live in residence. (Significantly more, 98-99%, of the other respondents live in residence.) The Ryerson student, even though she has chosen her profession in the face of indifference or even negative influence, remains for the most part in daily contact with and open to the opinions and pressures of family and community. The hospital school students, by contrast, who report the closest congruency in influences, as well as the School A students to a great extent, remain largely in the environment of their residences — an environment which undoubtedly continues to support the choice of nursing program which they have made.

2. *Nursing Selection Inventory*

The *Nursing Selection Inventory* consists of two parts. On the first, the *Self-Image Characteristics Scale*, the respondents were asked to rate themselves on a series of personal characteristics in order to provide a measure of strength of Self-Image. On the second, *the Nursing Profession Characteristic Scale*, the respondents selected from a list of statement those they felt actually described nursing and then rated their importance in the process of choosing to become a nurse. The respondents, in this way, described themselves and the nursing profession within set limits and in terms that allowed comparison and contrast among the groups participating in this study.

A. Self-Image Characteristics Scale

This scale consisted of a series of thirteen self-descriptive items contained within four dimensions, — Organizational competence, Interpersonal Competence, Self-Confidence and Self-Discipline. While these dimensions were adopted from Dr. Robson's[12] work on recruitment to the nursing profession, the items themselves were modified and revalidated. The respondents were asked to rate themselves on each of the items, on a four point scale. The items were as follows:

1. I am at ease when meeting strangers.
2. I am very feminine.
3. I am very intelligent.
4. I am someone to whom others frequently look for help and advice.
5. I am someone who always has her way of doing things well organized.
6. I am able to accomplish easily the kind of complex work which requires the inter-relation of many details.
7. I am able to do many things well.
8. I am an exceptionally efficient person.
9. I am a person who can control her emotions in unsettling situations.
10. I am able to get along well with most people.
11. I am a person who readily puts pleasure off until later if work is called for now.
12. I am able, even when I have made definite plans, to fit in the unexepected without becoming upset or flustered.
13. I am able to make a study schedule and stick to it.

A mean score was computed for each school over each dimension and a mean composite score over all four dimensions. As can be seen from Table 1 there is no significant difference in either composite or dimensions scores. The rank order on composite scores is: School B, Ryerson and Schools A and C; the rank order within each of the dimensions varies.

The highest possible score which could have been achieved on Dimension A (Organizational Competence — Items 5, 6, 12) is 12. The respondents from Ryerson and Schools A and B fall at the

midpoint of the scale range (6); School C falls slightly below. The respondents rate themselves as being not too strong or too weak in terms of organizational abilities.

Dr. Robson's findings are apposite if not analogous to those mentioned above.[13] Thirty-three per cent of the nurses, 50 per cent of the occupational therapists, 36 per cent of the social workers and 24 per cent of the practical nurses he tested were found to have rated themselves above the median on the characteristic "organizational competence". The nurses he tested certainly did not, in comparison with all others groups, rate themselves highest; they were somewhat "average" on the characteristics, as were the respondents in this study.

TABLE I

SELF-IMAGE CHARACTERISTICS SCALE
*MEAN SCORES BY DIMENSION FOR RYERSON AND SCHOOLS A, B AND C, 1968-69

School	N	Dim. A	Dim. B	Dim. C	Dim. D	Mean Comp. Score
Ryerson	24	6	6	7	6	25
School A	60	6	6	8	4	24
School B	124	6	7	8	5	26
School C	109	5	6	8	5	24
‡Midpoint of possible scores on scale		6	6	8	6	

*No significant difference of means.
‡Midpoint varies from dimension to dimension as there are an unequal number of items per dimension.

In Dimension B (Interpersonal Competence — Items 1, 4 10) the pattern across schools is similar. Here again the highest possible score is 12. On this dimension, all schools fall at the midpoint of the scale (6) with the exception of School B, with a self-rating of 7. Robson found that nurses tended to rate themselves somewhat higher on Dimension B than on Dimension A; with 53 per cent of the nurses, 65 per cent of the social workers, 63 per cent of the physiotherapists and 50 per cent of the pratical nurses rating themselves above the median on this characteristic.

On Dimension C (Self-Confidence — Items 2, 3, 7, 8) the highest possible score is 16. Three of the schools, A, B and C, fell at the

midpoint of the score range (8); at Ryerson, however, the respondents gave themselves a rating of 7. This finding tends to complement data collected on young Ryerson graduates [14] who were seen both by themselves and by their head nurses as having less self-confidence than other young graduates. On this characteristic, Robson found that the per cent of nurses who fell above the median was higher than that of physiotherapists and practical nurses, but the same as social workers.

On the last dimension, D, (Self-Discipline — Items 9, 11, 13) the highest possible score is again 12, with a midpoint of 6. The pattern here shows the least similarity with the other three dimensions. Three of the schools, A, B and C, rate themselves below the midpoint; the respondents from Ryerson do not. This again complements the findings from the graduate interviews [15] in which young Ryerson graduates are rated above hospital graduates in setting their own limits, reaching decisions and carrying out their plans. Robson found, however, that more nurses than physiotherapists, social workers or practical nurses fell above the median on this characteristic.

In conclusion, there is no significant difference in strength of Self-Image of the respendents from the four schools of nursing. They tend to see themselves as somewhat "average" over all characteristics. As might be expected in a profession involved with people, they rate themselves highest on "Interpersonal Competence"; but in a profession which offers so many rules, regulations and limits they rate themselves lowest on "Self-Discipline". The Ryerson respondent's self-image is weakest in terms of self-confidence; the respondent's from the autonomous and two hospital chools, in terms of self-discipline. Further, while Robson found that 27-53 per cent of the nurses tested rate themselves above the median (for all groups tested) on the various self-image characteristics, it is on "interpersonal competence" that the largest group (53%) fell above the median.

B. Nursing Profession Characteristics

The second part of the *Nursing Selection Inventory* asks the question: *What are the characteristics that the respondents believe are essentially descriptive of the nursing profession? Which of these do they feel were important enough to attract them toward a career in nursing?* The Inventory is composed of thirty-seven statements descriptive of nursing. These are grouped into four dimensions [16] (Intrinsic and Extrinsic Self-Benefitting, Family and Society Benefitting). Sample items by dimensions are as follows:

Sample Items:

Dimension I : Society Benefitting

1. Nursing is an occupation which is very useful to society in general and in which I can directly benefit my fellow man.
2. Nursing is an occupation in which I can help people who are faced with human problems or suffering.
3. Nursing is an occupation which helps all levels of society in times of trouble.
4. Nursing is an occupation in which I will be able to make the world just a little bit better.

Dimension II : Family Benefitting

5. Nursing is an occupation in which I will learn things which will make me a better wife and mother.
6. Nursing is an occupation in which I can always be sure of finding a job if I need to provide money for my future family.
7. Nursing is an occupation in which I will learn about people so that I will be better able to understand my husband and family.

Dimension III : Intrinsic Self-Benefitting

8. Nursing is an occupation which will call upon me to use my intelligence and judgment.
9. Nursing is an occupation for which I have special abilities and aptitudes where I can develop and excel.

Dimension IV : Extrinsic Self-Benefitting

10. Nursing is an occupation which will allow me to look forward to a stable, secure future.

What factors did the respondents identify as being descriptive of nursing and influential in their career decision? When respondents rated the "nursing characteristics" on a four point scale (ranging from "not important" to "very important"), no significant difference emerged between Ryerson and the three other schools in mean score, on any of the dimensions. However, on examining individual items, a pattern emerges of similarity between Schools B and C, the two hospital schools. School A, the autonomous school, is at times associated with Ryerson. The mean scores across all four groups of respondents and the rank order of groups of respondents is presented in Table 2.

Certain characteristics as indicated by scores on specific items were rated "higher" by some groups of respondents than by others. A very high score indicates that the characteristic was very important to the respondents in choosing to become a nurse. In the dimension, "Society Benefitting", as in all dimensions but "Extrinsic Self-Benefit-

TABLE 2

NURSING PROFESSION CHARACTERISTICS SCALE RANK OF GROUPS OF RESPONDENTS BY DIMENSION AND COMPOSITE MEAN SCORE FOR EACH DIMENSION, 1968-69

	DIMENSIONS			
	Society Benefitting	Family Benefitting	Intrinsic Self-Benefitting	Extrinsic Self-Benefitting
Rank Order of Groups by Dimension	School B School C Ryerson & School A	Schools A & C Ryerson & School B	All four groups of equal rank	Ryerson Schools A & B School C
Mean Score Across All Four Groups	19.2	18.5	17.0	10.0

ting", the respondents from the two hospital schools identify more characteristics of the nursing profession as strong motivational factors in their choosing to become nurses, than do the other respondents. The respondents from Ryerson and School A do not deny that many of these characteristics did influence them, but they do not attribute to these characteristics the same magnetic strength. Schools B and C rated "highly" all four of the sample items from Dimension I (Society Benefitting) shown above. Ryerson concurred on Item 2, and School A on Item 3. All four schools gave a "high rating" to the first item.

On the dimension, "Family Benefitting", the respondents from School C rate many of the items highly (i.e. Items 5, 6, 7 shown above) and those from Ryerson and School B rate one highly (i.e. Items 6 and 5 respectively), School A students see none of these characteristics in so favorable a light. The picture is in a way reversed for the dimension, "Intrinsic Self-Benefitting", where none

of the Ryerson respondents feel so strongly about any of these nursing characteristics, while the other groups of respondents rate some of the items highly (i.e. Schools A, B and C rated Item 8 "highly" and Schools A and B Item 9). The respondents from Ryerson and School C are the only respondents to give a "high" rating within Dimension IV (Extrinsic Self-Benefitting) — but only to the one item shown above, "Nursing is an occupation which will allow me to look forward to a stable, secure future."

These results are in some ways complimentary to those presented by Robson. He states "while almost all those who plan to become nurses like the idea of being able to help people in need, only about one half unfavorably disposed toward nursing feel the same way".[17] Later he points out :

> It is interesting to note that the greatest consensus among the girls who were sampled concerning the image of the nursing profession occurs in connection with the characteristics which have to do with the nurses' relations with others on the job; three out of four girls say that being a nurse would give them tremendous satisfaction in knowing that they are helping people in need.[18]

Further, he reports that 39 per cent feel that being a nurse offers a sense of security,[19] and, while the present findings indicate that the sense of security is rated fairly low among the various characteristics, it is of importance to at least some of the respondents from Ryerson and School C. Robson lists five items in rank order as being particularly attractive in the choice of a nursing career. These are: training period; an adequate income; higher prestige than other occupations open to women; meeting interesting people; and helping people in need.[20] The students from Ryerson and Schools A, B and C who actually have chosen nursing as a career rate those items in inverse order. Helping people in need has been given by far the highest rating; such factors as high prestige or adequate income are rated much lower by students from all four schools of nursing.

The responses indicate that the respondents on the whole feel that nursing is a profession which allows intrinsic benefits (fulfilment, creativity, etc.) and which provides opportunities for contributing to their families (present and future) and to society in general. They do not think of it as an occupation which primarily provides extrinsic rewards (money, travel opportunities, etc.). Indicative of this consensus are the four items, all included within the Extrinsic Self-Benefitting dimension, rejected by the largest per cent of respondents (see Table 3).

TABLE 3

NURSING PROFESSION CHARACTERISTICS SCALE ITEMS REJECTED BY THE LARGEST PER CENT OF RESPONDENTS AS NOT BEING DESCRIPTIVE OF NURSING, 1968-69

Respondents rejecting the statement	Items Not Considered Descriptive of Nursing
79-91%	Nursing is an occupation which may have little responsibility but has regular hours or routine.
38-63%	Nursing is an occupation which pays better than other jobs with a similar length of preparation.
33-50%	Nursing is an occupation where I can work in a variety of situations, so that I can move whenever something doesn't please me.
26-40%	Nursing is an occupation which will provide me with an income and enough free time to do what I wish and to go where I wish.

It would seem then that the respondent's view of nursing at the time of recruitment does not include high pay, freedom to change positions, easy travel or little responsibility.

In conclusion, while there is no significant difference in mean scores of dimensions between Ryerson and each of the three other schools of nursing, there would seem to be variation in the specific characteristics of the profession which most strongly influence the choice of nursing as a career. And while the greatest similarity in pattern of attractive features seems to emerge between the two hospital-based schools, all four schools share in rejecting the majority of "Extrinsic Self-Benefitting" characteristics of nursing as being strong motivational factors in their choice of a nursing career.

C. Relationship Between Self-Image Characteristic Scale and Dimensions on the Nursing Profession Characteristic Scale

The question was asked: *How does a high Self-Image relate to motivation in choosing nursing as a career?* In submitting the data to statistical analysis, no clear pattern of significant relationships emerged between "Self-Image" ratings and the importance of the various types of nursing profession characteristics which served to

influence students to choose nursing as a career. Robson's results [21] seemed to indicate that the more favorably disposed toward nursing an individual was, the higher they rated themselves on the Self-Image Scale; thus he was able to relate "Self-Image" with "Ideal Nurse" and nursing characteristics. The data presented above, however, do not allow one to infer a relation between "Self-Image" and "Nursing Profession Characteristics".

3. Expectations and Experiences in Nursing

The third and final instrument administered at the beginning of the nursing program was the *Expectations and Experiences in Nursing Questionnaire*. The first part of this instrument dealt with the anticipation of experiences as student nurses; the second, with those following graduation from a nursing program.

A. Expectations as a Student Nurse

In the first part of this instrument, respondents were presented with a list of thirty-five possible aspects or experiences of life as a student nurse. These were compiled from statements made by student nurses and young graduates concerning their student experiences.[22] The items were grouped under six headings as follfollows: (with sample items)

1. The student herself
   Item : The freedom and responsibility of being on your own.
2. The school of nursing and its program
   Item : Exams/studies/assignments.
3. The process of becoming a nurse
   Item : Mastering nursing procedures and techniques.
4. The giving of nursing care
   Item : Caring for patients who have a terminal or chronic illness.
5. Specific type of nursing care
   Item : Psychiatric nursing
6. The settings in which nursing care is given
   Item : Relationship with hospital or agency staff.

The respondents were asked to indicate which of these items (experiences) they consided to be aspects of life as a student nurse, and, of these aspects, which were anticipated in a positive, somewhat positive, somewhat negative or negative light.

Table 4 shows a distribution by per cent of the responses from all four groups of respondents over all items contained in the questionnaire. These figures represent the per cent of respondents from each school anticipating the various "experiences" contained within

TABLE 4

EXPECTATIONS AS A STUDENT NURSE
PER CENT OF RESPONSES BY CATEGORY OVER ALL ITEMS FOR RYERSON, SCHOOLS A, B AND C, 1968-69

School	Per Cent of Respondents Who View the Various Items in Relation to Life as a Student Nurse as :				
	Positive Aspect	Somewhat Positive Aspect	Somewhat Negative Aspect	Negative Aspect	Not an Aspect
	%	%	%	%	%
Ryerson	58.1	17.3*	7.7	4.0*	12.7*
School A	54.3	26.0	9.0	2.6	7.5
School B	59.3	23.8	8.0	2.5	7.2
School C	59.3	21.8	9.3	2.0	6.4

*Significant difference between Ryerson and other three schools.
N = Ryerson: 24; School A: 60; School B: 124; School C: 109.

the questionnaire, in a favorable or unfavorable light. Significantly more of the respondents from Ryerson, as compared with the three other schools, look upon the various descriptive statements as not being characteristic of nursing or as having negative connotations. While the distribution of per cents differ little in the "Positive" category, significantly fewer of the same Ryerson students look upon these characteristics in only a "Somewhat Positive" light. The Ryerson respondents then have fewer expectations, but those they do have they tend to enunciate in a strongly positive or a strongly negative light.

The distribution of responses under the first heading, the *Student herself*, shows some variation among groups, with a difference which is statistically significant at only the .2 level between the Ryerson respondents and those from the two hospital schools of nursing. Many (42%) of the Ryerson respondents, as compared with 20-30 per cent of the others, have strongly positive feelings about being "responsible financially for their education". But less (66%) of the Ryerson students, as compared with 86-92 per cent

of the others ,look forward to the development of new friendships. On the whole, all of the respondents feel that "being on their own" is a very positive aspect of life as a student nurse. A significant difference (at the .2 level) is found only between the Ryerson and School B responses to the items grouped under the second heading, the *School of nursing and its program*. This grouping, however, allows more contrast than do the others. For example, 79 per cent of the Ryerson respondents look forward, most positively, to learning "nursing theory", and 96 per cent to participating in "their school's type of nursing education program" as compared to 56-66 per cent and 80-87 per cent of the other respondents respectively. However, only 8 per of these same Ryerson respondents have such strongly favorable expectations about "living conditions", while 45-80 per cent of the other respondents do so. And, while approximately half of all the respondents see "Being taken as an example of your school or defending your school's reputation" as a positive aspect of life as a student nurse, a high of 6 per cent of School B's students as compared with none of the students from Ryerson regard it negatively.

There is no significant difference in the distribution of responses to the third and fourth group of items, *Becoming a nurse* and *Giving nursing care*. There are, however, some contrasts on the level of individual items. For example, those who have strongly positive feelings about the "whole process of becoming a nurse" number about 70 per cent of respondents from Ryerson and School A, but nearly 90 per cent of hospital-based students. And, while approximately 20 per cent fewer Ryerson respondents, as compared with the others, eagerly anticipate the "achievement of a high level of nursing standards" and the "mastery of nursing procedures and techniques", 20 per cent more of the Ryerson students consider progress though "nursing evaluations" as a pleasant prospect.

The items contained within the fourth grouping, *Giving nursing care*, are of particular interest in that they include two of the nursing experiences rated "Negative" by the greatest number of respondents. These are "caring for patients who are dying" (strong "Positive" feelings: 13-37%; strong "Negative": 9-21%) and "caring for patients who have terminal or chronic illnesses" (strong "Positive": 13-46%; strong "Negative": 3-18%.[23] Students from School A anticipated both types of patient care with the least favorable and the most negative expectations of all groups of respondents. In contrast however, more than two-thirds of all

respondents expect that "developing relationships with patients" and "seeing them improve" will be most pleasant.

The fifth grouping, *Specific Types of Nursing Care,* again accounts for a difference at only the .2 level of significance, between Ryerson and the two hospital-based schools. About three-quarters of all respondents eagerly anticipate "obstetrics" and "pediatrics"; and about two-thirds "the operating room". But, while 70 per cent of the Ryerson students have pleasant expectations about "psychiatric nursing" and 55 per cent about "public health nursing", only 40-55 per cent of the other respondents are equally pleased with the former, and only 24-43 per cent with the latter. The rank order of preference for nursing specialties for the various groups can be seen on Table 5. The Ryerson student tends to differ from the others, in the higher preference she expresses for psychiatric nursing.

TABLE 5

EXPECTATIONS AS A STUDENT NURSE
RANK ORDER PREFERENCE OF NURSING
SPECIALTIES AT RYERSON AND SCHOOLS
A, B AND C, 1968-69

Nursing Specialties	Rank order preference at Ryerson	School A	School B	School C
Pediatrics	1	2	2	2
Psychiatry	2.5	4	5	5
Obstetrics	2.5	1	1	1
Medicine	4	6	4	4
Operating Room	5	3	3	3
Public Health	6	5	6	6

The set of items grouped under the final heading, *Nursing setting,* shows a significant difference between Ryerson and the two hospital schools at the .05 level, and between Ryerson and School A at the .1 level. More Ryerson respondents feel strongly positive (45%) or strongly negative (13%) about "travel time to and from clinical facilities" than do the others groups (with about 25 per cent and 4 per cent respectively). Further, not only do more Ryerson respondents react negatively to the thought of "tasks not immediately related to patient care assigned by hospital staff" (17% from Ryerson, 5-8% from other groups) but fewer anticipated the "type of clinical facilities used" in their program with great enthusiasm (42% from Ryerson, 60-63% from other groups).

While it is only on this last set of items that the significance level reaches .05, the findings on the whole tend to form a pattern. The greatest similarity appears between the two hospital-based schools, the greatest difference between these two schools and Ryerson. It would seem then that the type of school of nursing selected is in some way related to the expectations students have of life as a student nurse. On the one hand, the least difference is found among groups in their anticipation of the *Process of becoming a nurse* and of *Giving nursing care*. On the other, the greatest difference exists between respondents from a school in an educational setting and those from hospital-based schools in terms of their expectations of the *Nursing setting*. These expectations of the *Nursing setting* included such factors as the type of clinical facilities used and the relationships between student and staff within the nursing unit.

In conclusion, the setting of the school of nursing does not seem to be independent of the expectations of the student recruit. Those schools with residence life (Schools A, B and C) seem to attract students who look forward to extended peer relationships and new friendships. The students from the autonomous school (School A) feel highly positive about achievement and high standards. Those from Schools B and C, and to a somewhat lesser degree School A, favor extended patient contact, good clinical facilities and mastering the procedures and techniques of nursing. The students from the school in the educational setting on the one hand look forward much more than do the others to nursing theory, to progress through evaluation, to the forms of nursing where educational and preventive techniques are critical (i.e. psychiatry, on the other, they show greater reluctance to undertake ward tasks not directly related to patient care.

B. Expectations Following Graduation

The proposition was put to the respondents that following graduation from their school of nursing, there was a period of approximately forty years when they could be part of the work force. They were asked to consider these years between graduation and possible retirement; and then to answer the question: *To what extent would you expect to participate in the nursing profession if you were to remain single? If you were to marry?* There is a decrease in the per cent of respondents who expect to work full-time from early twenties to the fifties and sixties for all groups. The rate of decrease tends to be gradual if the respondents were to remain single; sharp if they were to marry. For example, a mean of 90 per

cent of the respondents if single, and 80 per cent if married, expect to work full-time in their early twenties, whereas in the late twenties and early thirties the means drop to 81 per cent and 15 per cent respectively; and finally, during the fifties and early sixties, the projected per cent of respondents working are 24 and 14 respectively.

While the distribution of responses does not differ significantly from school to school if the respondents remain single, generally more of the Ryerson respondents expect to work full-time throughout the possible work years. However, there is a greater difference in the projected work patterns in the event of the respondents marrying. While 80-88 per cent of the others expect to work full-time during their early twenties if married, only 63 per cent of the Ryerson respondents do. But, while the per cent expecting to work during the other stages of their lives (if married) ranges from 3 per cent to 12 per cent, a core of over 25 per cent of the Ryerson respondents expect to continue as full-time members of the work force.

While it seems that more of the Ryerson respondents intend to make a full-time career of nursing, significantly more expect to sever all connections with and interest in nursing at the time of graduation (a high of 7.3 per cent of Ryerson respondents as compared with a low of .5 per cent of School C respondents). However, considerably more hospital-based respondents expect to continue to work part-time, particularly if married and particularly during their thirties and forties.

If might be concluded that there is a strong career orientation among the Ryerson respondents, but a feeling among those from Schools B and C that participation in nursing is secondary to their involvement in family life. However, while respondents from the hospital-based schools generally expect to maintain their initial interest in the profession, a fair number of the Ryerson students do not. More of the respondents from School A than from Schools B and C, but less than from Ryerson, anticipate full-time participation in the nursing profession over the years. Yet, more from School A than from Ryerson expect to maintain an active interest in the development of the profession.

The respondents were next asked : *What position(s) would you expect to be able to obtain after a reasonable amount of experience and the appropriate preparation ?* Twelve positions in nursing administration, education and public health were listed (i.e. team leader,

instructor, public health nurse, director of nursing). Generally the respondents from the two hospital schools are the most pessimistic in that they see themselves less able to obtain a variety of these positions over the years. Only 10 per cent of the Ryerson respondents and 11 per cent from School A anticipate not being able to obtain the positions they desire, while 16-17 per cent of those from Schools B and C express this fear. The respondents do see more extensive preparation being required in positions located further up the administrative ladder. They seem to feel that positions such as team leader or head nurse demand "clinical specialty" courses while those of instructor or director of nursing would be more available with university preparation.

In comparing and contrasting the various groups, the respondents from Ryerson see themselves able to obtain equally as well positions of head nurse, public health nurse, and instructor, or more advanced positions in nursing administration, such as director of nursing or of nursing services. This difference beween Ryerson and the two hospital schools is significant, with nearly 20 per cent fewer hospital respondents anticipating such positions. The students from the autonomous school, however, are most confident of obtaining positions as public health nurse or supervisor. And while the hospital-based students are generally less confident, except perhaps with the lower level hospital positions such as team leader or head nurse, they do see the position of instructor as being more available than positions of supervisor or director of nursing service.

The conclusions drawn earlier that the Ryerson respondents tend to be more interested in a long term career in nursing are complemented by the findings that more of these same respondents anticipate higher level positions within nursing. However, the expectation (since the Ryerson program is situated in an educational setting) that these students would see themselves more in educational than administrative positions, is not supported.

The final question relating to expectations following graduation concerned salary. *Into what salary range would you expect to fall if working full-time as head nurse, director of nursing, etc ?* The categories of responses were: top, upper middle, lower middle and lower salary range for Canadians. On considering the expectations of the four groups of respondents for the different positions, it seems that they are fairly optimistic about the remuneration offered in all positions above the level of team leader. Fifty to nearly 100 per cent expect to be in at least the upper middle salary range. On the lower level positions, Ryerson respondents are the most optimistic;

as staff nurses, for example, the per cent expecting a high salary is significantly larger than the per cent from other groups. However, the relationship of responses is inverted for the higher level positions in adiministration and education. When the salary expectations are rank-ordered for these higher level positions, the order of respondents from most to least optimistic is : School B, School C, School A and then Ryerson. It would seem then that the Ryerson student, who tends to be somewhat more career oriented and who expects to achieve advanced positions in nursing, is most realistic in her expectation of the remuneration offered (with the exception, of course, of the lower level position such as staff nurse).

4. Summary

In summary, it would seem that there is both variety and similarity in the backgrounds, attitudes and expectations of the students recruited to the schools of nursing housed in different types of settings. Respondents from School A, as compared with the others, tend to come from homes with fathers whose occupation is professional or executive; where both their parents have had more education (particularly university education), where more education is anticipated for their siblings, and where some further education is anticipated for themselves. The Ryerson respondents, however, while more similar in background to those from the two hospital schools, seem to be much more ambitious for themselves than any of the other groups of respondents. They look for more upward mobility through further education.

Did these students feel influenced by friends, relatives or other members of the community in their choice of nursing as a career? Peer influence would seem to be limited in that only about 20-25 per cent of the close friends of these respondents entered schools of nursing while more than 40 per cent went on to university. All of the respondents know at least one nurse and one doctor, but while Ryerson respondents are acquainted with more generally, the respondents from School C include among their friends and relatives the highest per cent who favor nursing as a career.

The hospital-based students (Schools B and C) report the most influence from family, friends and relatives. In fact, Ryerson students report significantly less influence toward nursing as a career from such traditional sources as well as from the community than do the hospital-based schools. The independent school, School A, falls somewhat between the two, reporting on the whole less familial and peer influence than Schools B and C students, but more than Ryerson. In

general, the majority of students are influenced toward nursing as a career more by their friends and relatives than by the community as a whole. Ryerson students see themselves as more independent in choosing their career than do the other students, yet they follow the same general pattern.

The respondents differ in describing the process of choosing a nursing career and the specific school in which to learn the fundamentals of that career. While the students from the two hospital-based schools, particularly School C, tend to consider and finally to choose a nursing career early, those from Ryerson not only consider nursing for a far shorter time but also choose a school of nursing at a later date. However, while most respondents strongly prefer their own type of nursing preparation, it is generally believed that both the nursing profession and the community at large prefer hospital schools It is not unexpected, therefore, that most respondents consider enrolling in a hospital school of nursing before making a final choice of programs.[24]

The process, then, of choosing to be and beginning to be a nurse varies (at times significantly) from group to group. Ryerson (and to some extent School A) students encountered negative attitudes toward their choice. Hospital school respondents (and to some extent those from School A) prefer programs and choose schools of nursing which reflect not only the congruency of their opinions and those of the community, but also their general respect for reputation and tradition. The Ryerson respondents looked for a school with a liberal academic program and few rules and regulations. After enrolling in Ryerson, the students obtained diversified living arrangements where they might continue to meet critical reactions toward their careers; the students from School A and the two hospital schools moved into residence where fairly homogenous peer influences would tend to intensify their attitudes toward their career.

The respondents indicated the strength of their Self-Image as they rated themselves in terms of Organizational and Interpersonal Competence, as well as Self-Confidence and Discipline. In general, they would seem to see themselves as "average". On the one hand, as might be expected with a profession which is involved with people, the self-rating is highest on "Interpersonal Competence". On the other, in this same profession which offers many external rules, regulations and limits, these students rate themselves lowest on "Self-Discipline".

Ryerson students differ from the pattern only slightly, but in a way which correlates with and is supported by other findings.[25] While they

place themselves lower on the scale than do other students in terms of self-confidence, they see themselves better able to run their own lives and make their own decisions.

On giving their views of nursing, it would seem that the students, as a whole, do *not* think of nursing as an occupation which promotes extensive extrinsic benefits (money, security, travel, etc.). They *do* feel that it is a profession which provides intrinsic benefits (fulfilment, creativity, etc.) and will allow them to contribute to their family (present and future) and to society. And, while there is no significant difference among groups, it would seem that the choice of a nursing career by the respondents from the two hospital schools was motivated most by those characteristics relating to family and society and self-fulfilment. The students from Ryerson (and to some extent School A), while not unaffected by such characteristics, were also attracted by the extrinsic benefits of nursing.

Some expectations of life as a student nurse are shared by all the respondents; some are felt more strongly at one than at another school. Some experiences carry with them happy connotations; others do not. Ryerson and School A recruit students who look forward to the academic aspects of nursing. The students from the autonomous school with an established reputation (School A) feel highly positive about achievement and high standards. The more traditional hospital students are in favor of extended patient contact. The new school in the educational setting (Ryerson) has students who look to continual progress through evaluation and are more attracted by forms of nursing in which educational and preventive techniques are critical: psychiatric and public health nursing.

What are the students' expectations following graduation? Ryerson students expect to make more of a full-time career of nursing, the hospital students to work on a part-time basis during their married life. The students from the autonomous school intend to continue working least of all. Ryerson students have the most confidence in being able to obtain various positions in nursing,particularly in administration. Hospital students look more to educational jobs and the independent school to public health. Most are unrealistically optimistic about the comparative level of salaries they will obtain in the years to come.

What then has been discovered in examining the background, beliefs and expectations of the students recruited to the four different schools of nursing? The emerging pattern is one of greatest similarity between the respondents from the two hospital-based schools and the

greatest disparity between the respondents from those two schools and Ryerson. The respondents from the autonomous school would seem, in nature and inclination, to vary in likeness from one to the other as their educational setting is more similar to Ryerson, or to the hospital-based schools.

5. *Discussion*

The rationale for the data presented lies in the assumption stated on the first page of this chapter, "While the relationships and experiences of school life help determine the kind of professionals they (nursing school graduates) will become, the effectiveness of new stimuli is dependent in great part on previously developed responses and attitudes." Four schools of nursing recruited four groups of students. Were these groups truly different? Were they different enough to generate a response to their nursing programs which would foster within these students differing professional attitudes and outlooks? For this question to be useful, it must be asked in terms of the common characteristics of the groups entering the four schools rather than those of the individual recruit. Conclusions regarding the former permit generalizations about the type of program which recruited and subsequently educated these young women.

The Ryerson students came from homes where fewer parents were born in Canada, English was spoken less, more mothers worked full-time, more fathers had technical or vocational education, and less education was anticipated for siblings. In contrast to this picture, the students from School A, the autonomous school, had more fathers who are professionals, the least number of mothers who work, more parents with university education, and more siblings who expect to complete university education. Schools B and C recruited students who have more mothers who work part-time, parents with less education generally and fewer siblings who expect to complete advanced education.

Which group is most ambitious for themselves? Ambitious they are in that they are not imitating their parents or peers, but rather have chosen to become socially mobile through education and occupation. Ryerson students expect to complete more university education, anticipate obtaining the highest positions in nursing and plan to a greater extent to maintain full-time nursing careers. School C, however, has the smallest number of students who anticipate undertaking post-basic education, obtaining higher level nursing positions and continuing to work full-time if married.

Were there differences in choosing a career and a school of

nursing? Ryerson students chose nursing and their school at a later date, despite family and community opinion. School C students were given the most family support and many of them chose nursing as early as primary school. Schools B and C generally received the most family and community support. The students who chose School A received full family support but less community support. All students felt that the community prefers hospital school nursing programs for the preparation of nurses.

What characteristics might these students look for in a school of nursing either because of, or despite, pressures and norms of the community? The Ryerson Student chose her course because of its liberal program and permissive rules and regulations. School A students looked for high academic standards, a school with a good professional reputation. Students from the two hospital schools looked for a program with extensive clinical facilities and a well-developed reputation. All groups at least considered enrolling at a hospital-based school of nursing.

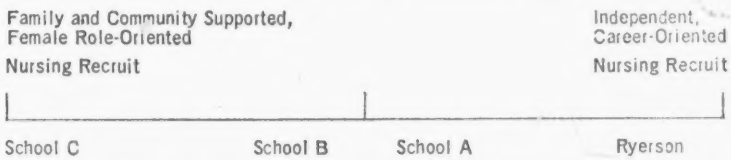
Nursing has long been defined by the community as a semi-professional occupation where women can acceptably develop the female role. In turn the profession has offered many external rules and regulations and a set administrative hierarchy. The individual to function well within such a milieu must relate with others and be willing to accept external sanctions and organization. Do the students see themselves as such? The Ryerson student, who seems most independent and most ambitious, rates herself higher than the others do on self-discipline. It would seem, however, that in departing from tradition she must pay a price; she rates herself the lowest of all on self-confidence. The students from School B are highest in the self-rating on interpersonal competence while those from School C are lowest in organizational competence. The students from School A are "average" in that they are neither highest nor lowest on any of the self-image ratings.

Assuming that behavior is basically consistent, one could predict that motivation is interrelated with the individual's self-image and value system. School C students, who were influenced most by their families and the community, and School A students, who were supported by their families but less so by the community, were motivated to choose nursing as a career by factors which could be classified as "family benefitting". School B students, who were also given much community support, rated "society benefitting" factors highest. Ryerson students, who made their career choice despite family and com-

munity, rated "self-benefitting" factors such as salary and travel opportunities, as motivating them strongly to choose nursing.

Do the students' expectations of life as a student nurse fit as a part of a mosaic which will show a composite picture of the groups as they choose a particular school of nursing? The Ryerson student who has made and maintained her decision with less support has fewer strongly positive expectations of life as a student nurse. Further, having chosen a program in an educational setting, she has more negative expectations of relationships with staff in the hospital setting, but more positive feelings about intellectual development. The students at Schools B and C look forward to their clinical practice and to the relationships they will develop, not only with their faculty but also within the organizational hierarchy. School A students look forward to academic and professional excellence — to developing and maintaining the highest of standards.

Are then these groups of recruits different one from another? The answer hangs, of course on the meaning of "different". They are very much the same in that they have chosen to be nurses. Perhaps the answer could be found in terms of a theoretical schema. A continuum might be drawn with the family and community supported female-role oriented individual at one extreme and the independent, career-oriented individual at the other. Perhaps the groups of students recruited to the different schools might be placed along this continuum — School C students, School B students, School A students and Ryerson students. However, even though the data support such a theoretical continuum, as well as the inference that the different



schools do indeed recruit different groups of students, a basic dilemma remains. Schools with different atmospheres and value structures recruit nursing students; students if offered the opportunity, look for a program which will permit them to maintain their value structure at the same time as they are developing within the limits of the program. Schools such as Ryerson, School A, School B and School C function with philosophies and approaches which are contrary rather than contradictory to each other. The onus is therefore on the nursing profession itself to decide whether one or all of these

approaches are to be encouraged in the recruiting and preparing of individuals as nursing practitioners.

Further, the students who enrolled at Ryerson would seem, through these contrasts to be a component part, as they begin a nursing career, of a subtle but definite social transformation. Given intelligence and material support, but lacking in confidence and moral sustenance from family and group, they emerge as nursing recruits of a very special mark. By choosing to become nurses they do not see themselves defined as women within a close knit family group, but as practitioners of a skill within a larger community. They expect rewards and benefits from that larger society in terms of social mobility, and continuing possibilities for advancement and monetary gain.

The nursing community in Ontario, it would seem, has been the vehicle of this social transformation. To what extend this transformation within nursing has been paralleled by similar processes within the legal, educational and medical professions is a question far exceeding the defined scope of this research. Having discovered this development within a part of society, it would seem possible that it is a general trend and not endemic to the nursing profession alone.

This tranformation, demonstrated in nursing and suspected in the other professions as well, generates some important questions for the nursing profession in the Province of Ontario and possibly the rest of Canada. To what extent are we ready with continuing education for the new group we are creating? For them, education and the possibilities of further advancement is the breath of their professional life. Does the profession wish to accelerate or arrest this transformation? Does it know how to do either? Should the Ryerson program in the type of student it attracts be seen as an anomaly or as a pattern of nursing education to be fostered and developed?

Footnotes (Chapter 4)

1. While Chapter 6 presents a study of change in the graduating nursing student, based on Dr. Sanford's work with university students, [see Joseph Katz et al, *No Time for Youth: Growth and Constraint in College Students* (San Francisco: Jossey-Bass Inc., 1968) pp. 1-122], the data analyzed here in Chapter 4, parallel much of the introductory information obtained from the university respondents. An analysis of both the general information and the data on change allowed the drawing of an insightful and cohesive picture of the student over time.
2. See Chapter 1, pp. 4-5, for a more detailed description of the four schools of nursing. In short, these schools are (by setting): Ryerson — Educational setting; School A — autonomous; School B and School C — hospital setting.
3. See Appendix for development and validation.
4. See Appendix for development and validation.

5. See Appendix for development and validation.
6. When the term "significant" or "significantly" is used, it means a statistically significant difference at the .05 level.
7. The comparisons done above and throughout the rest of the *Introductory Information Questionnaire* are based on data collected on one class, registering at each of the four schools during the month of September of 1968 (Ryerson — N: 24; School A — N:60;; School B — N: 124; School C — N: 109. However, when the Ryerson results for this particular class of students were compared and contrasted (where appropriate) with the results of three other consecutive classes of student nurses enrolling at Ryerson in the years immediately prior to these data (1965 — N:23; 1966 — N: 31; 1967 — N: 35), no significant differences were found. At times, because of expansion and modification of the questionnaire to its final form, some of the data did not allow direct comparison.
8. It is interesting to note that it is these mothers of respondents from School A, who have completed a more advanced level of education, who work the least.
9. It might be noted that School C has the fewest number of students who see themselves going on to university after nursing and the largest number of students whose siblings anticipate technical or vocational school education.
10. Ryerson has, since this time, opened extensive residence facilities for female students. The proportion of the nursing students who elect to live in residence would of course bear on the findings here and at other points in this study.
11. While it might seem paradoxical that students both reject alternate programs and choose their own on the grounds of "high academic standards", the explanation lies in the fact that they view their program as "academically superior", yet believe that it is neither as theoretical nor on as high an academic level as university programs.
12. R. A. H. Robson, "Sociological Factors Affecting Recruitment Into the Nursing Profession", *Royal Commission on Health Services* (Ottawa: Queen's Printer, 1967) See Appendix for modification and revalidation of items.
13. *Ibid.* It should be remembered, that while the dimensions used were the same as Dr. Robson's, the items were modified and revalidated.
14. See Chapter II for a discussion of the Ryerson graduate.
15. See Chapter II as in Note #14.
16. Robson, *Royal Commission on Health Services.* These dimensions like those of the *Self-Image Characteristic Scale* were generated through Dr. Robson's work on recruitment to the nursing profession.
17. *Ibid.*, p. 50
18. *Ibid.*, p. 49
19. *Ibid.*, p. 50.
20. *Ibid.*, p. 50.
21. *Ibid.*, pp. 54-55.
22. See Appendix for development and validation.
23. In comparing these results with those in Table 4 it can be seen that the "most negative" category in the general distribution of responses does not rise above 4 per cent.
24. It should be noted, however, that many of these respondents also considered university preparation.
25. A "weakness" of the Ryerson graduate, identified both by herself and by her head nurse, was lack of confidence in self in the work situation, despite a most adequate performance. (see Chapter 11.)

PART II

THE STUDENT IN THE SYSTEM

CHAPTER 5

STUDENT LIFE

What are the respondents' friendship and activity patterns? Do they vary from group to group? From junior to senior student? What influences or pressures do they feel from the school environment toward a general outlook in life? What is their approach toward nursing?

As a student nurse, the individual is exposed to a great diversity of experience and influence. Among these are, of course, not only the formal aspects of the curriculum and the beliefs and attitudes of the faculty but also the peer relationships and activities both formal and informal, which form a major part of student life. A series of three questionnaires was completed by the respondents at a point halfway through their nursing programs, and again at the end when they were senior students. The purpose was to determine activity and friendship patterns (through the *Activities Questionnaire*)[1] and to learn something of the effect of the internalization of experiences as a student nurse, both on the respondent's general outlook (through the *School Life Questionnaire*) and on her approach to nursing through the *Nursing Approach Questionnaire*).

1. *Activities Questionnaire*

It has long been suggested that the relocation of schools of nursing in educational settings offers the students advantages which extend even beyond that of study in an academic milieu. It is hypothesized that the nursing student in such a setting will interact with many other students of diverse interests; she will participate in a variety of organizations and activities; she will not only learn to nurse but will also grow and develop in an enriched and enriching environment. To test this hypothesis the question was asked: Is there a difference in friendships and in activities from setting to setting?

The *Activities Questionnaire*,[2] which was designed for the collection of data concerning the activities and friendship patterns of the

respondents, allows comparison and contrast not only across the four schools of nursing, Ryerson, and Schools A, B and C,[3] but also between respondents on two levels of development at each school. Part A focuses on peer relationships which have been maintained and/or developed after the respondents enrolled in their respective schools of nursing; Part B on the type and purpose of student activities and on the time allotted to these.

A. Friendship Patterns

The respondents were first asked: *About how many students, other than those enrolled in the nursing course at your school, do you know by name? How many of these acquaintances are friends?* Even though the Ryerson nursing program is housed in a general educational setting which allows greater opportunity for meeting other students, there is no significant difference in the number of friends or acquaintances reported by the various groups of respondents. However, the rank order of schools in terms of number of student acquaintances is: Ryerson, School B, School C and School A. And, while the number of acquaintances tends to increase from junior to senior year, the number of friends decreases.

Data were collected on heterosexual peer relationships by asking the single respondents *whom they "dated"* and the married respondents *if they had met their husbands at or through their schools of nursing.* While significantly more Ryerson respondents (as compared with respondents from Schools A, B and C) primarily date young men in some way affiliated with their school, a somewhat similar number of respondents from Ryerson and Schools A, B and C have boyfriends who work or who are enrolled as students in other educational institutions.

The data indicate a general trend toward earlier marriages for Ryerson students, as significantly more Ryerson Juniors are married (14%) than juniors from either Schools B or C, and significantly more (27%) Ryerson seniors are married than seniors from School C. Only 1 per cent of the juniors from School B and none of the other juniors met their husbands at a school function; this increases to a maximum of only 4 per cent for seniors from Ryerson and School A. Few respondents (0.4%) junior or senior, are married to husbands who were in any way affiliated with the institution housing the respondents' nursing program at the time of their meeting. The setting which provides the greatest freedom in life style and the greater opportunity for meeting young men (i.e. Ryerson) has more students who date such young men at 1 more students who marry younger.

While the pattern of heterosexual relationships tends to vary, *are there differences in the broader friendship groups which are typical of the respondents at the various schools of nursing?* In evaluating their "typical friendship groups" the respondents selected the most representative of the five patterns shown on Table 6 (e.g. a group composed of only the respondent and nursing students from her schoool). Few of the respondents, either junior or senior, felt that a group composed of only the "respondent and nursing students from her school" or "the respondent, nursing and non-nursing students from her school" typified their peer relationships. In considering those patterns which are representative, however, (Table 6) the

TABLE 6

ACTIVITIES QUESTIONNAIRE

FRIENDSHIP PATTERNS SEEN AS BEING REPRESENTATIVE OF RESPONDENTS AND THEIR GROUPS OF FRIENDS BY PER CENT AT RYERSON AND SCHOOLS A, B, AND C, 1968-69

Pattern Representative of Respondent & Her Group of Friends	Class	Ryerson	A School	B School	C School
A Group Composed of the:		%	%	%	%
1. Respondent and nursing students from her school of nursing	Jr.	0	9	7	8
	Sr.	0[3]	6	9	14
2. Respondent and people from outside her school of nursing	Jr.	32[1,4]	9	0	2
	Sr.	4	12	7	7
3. Respondent, nursing students and non-nursing students from her school	Jr.	5	0	1	5
	Sr.	0	0	0	0
4. Respondent, nursing students from her school and people from outside school.	Jr.	23[1,4]	67	68	74
	Sr.	58	67	62	66
5. Respondents, nursing and non-nursing students from her school plus people from outside her school.	Jr.	41[2]	15	24	12
	Sr.	39[2]	14	22	11

[1] Significant difference between Ryerson and each of three other schools of nursing.

[2] Significant difference between Ryerson and School A, Ryerson and School C.

[3] Significant difference between Ryerson and School C

[4] Significant difference between Ryerson junior and senior class.

greatest change from junior to senior years occurs at Ryerson where there is a significant decrease in the number of respondents who see the group pattern "respondent and people from outside her school" as representative of their friendship pattern and a significant increase in the number who so identify the pattern "respondent, nursing students from her school and people from outside her school". This latter pattern is the most common one among both junior[4] and senior students from Schools A, B and C, and among senior students from all programs. Among junior students from Ryerson, however, the most typical friendship group is the "respondent, nursing and non-nursing students from her school, plus people from outside her school". While nearly half of the Ryerson juniors have taken advantage of the opportunity to make friends with students enrolled in non-nursing courses at their school, the number of Ryerson seniors who maintain such friendships tends to decrease. However, both as juniors and as seniors, more Ryerson respondents included non-nursing students when describing their "typical" friendship pattern.

Further understanding of the respondents' peer relationships was sought through the questions: *What do your three closest friends do in terms of work or school? What are the most important activities you share with these friends? How much of your time do you spend with these friends?* There is no significant difference between the per cent of respondents from the four schools (Ryerson, Schools A B and C) who report having close friends engaged in one or another of the various educational or occupational pursuits. Common to all groups is the large per cent of respondents who have close friends enrolled with them in the same nursing program (85-97%). Ryerson has the largest number of respondents with friends working at some occupation other than nursing (as juniors 91%, as seniors 96%, as compared with 54-79% of the other juniors and 57-69% of the other seniors). Further, it has by far the largest per cent of juniors with friends who are students at other schools of nursing, working as nurses, or married and not working. However, there is little difference in the number of seniors from the various groups with friends so occupied. Students from Schools A, B and C generally have more friends who are students at a university, and as juniors have more friends who are students at a teacher or technical college.

While the differences between junior and senior years are not significant for any group of respondents, some of the educational or occupational categories show more change than others. At Ryerson the greatest change lies in the per cent of students who no longer

have friends who are nursing students at another school of nursing or working in some job or occupation other than nursing. The most general pattern which emerges over time is that of a decrease of friends from outside the respondent's own nursing program.

Social activities, companionship, discussions and school-life and activities are the most common interests that the respondents share with their close friends. While working and nursing life generally seem of less importance, residence life or activities as a roomate are rated as high or higher at Schools A, B and C. Few of the Ryerson respondents live in residences and few consider residence life as an important activity to be shared with their close friends.[5] This difference between Ryerson and each of the three other groups for both junior and senior years is, in fact, significant. Of least importance is shared participation in sports or special interests, such as art, music, politics, etc. The pattern which emerges is that of greatest similarity among Schools A, B and C. Moreover, the respondents from Ryerson (where activities such as sports and special interest programs are more available) tend not to consider sports and "special interests" as the important activities to be shared with close friends any more than do respondents from other schools of nursing. Further, there is a general decrease in shared interests and activities between junior and senior years at all schools.

The amount of time an individual spends with his close friends is a further index of the type of relationship which has developed and is being maintained. Less than a quarter of all respondents spent most of their free time with friends who are students in other courses in their school, at teacher's or technical colleges, married and not working, working as a nurse, or students at another school of nursing. The number of respondents generally who have friends of the seniors) is far larger than the number who can state that at other schools or universities (41-87% of the juniors and 20-88% they spend a major part of their leisure time with these friends (9-37% of the juniors, 0-31% of the seniors). Further, while the per cent of respondents from the different programs having close friends who are enrolled in their own nursing program is very similar, the per cent of Ryerson respondents, both as juniors and seniors who spend most of their leisure time with these classmates, is significantly less than the per cent of the other respondents who do so. [6] However, approximately 40 per cent of the Ryerson respondents and 63-90 per cent of the others do spend most of their leisure time with other students from their schools of nursing.

How do these patterns differ from the respondents' pre-nursing

friendship patterns? Up to 25 per cent of the respondents still report no change in their pre-nursing peer relationships as juniors, but as seniors this per cent has dropped to between 15-20 per cent. While the per cent of respondents who feel that their friends have become limited to students enrolled in their school of nursing tends to be fairly small (5-29%), more respondents from Schools A, B and C than from Ryerson and significantly more School C seniors than Ryerson seniors report such a limitation in their friendships. It would seem then that the major changes in friendship patterns seem to lie in making more and closer friends of a different type, with fewer Ryerson respondents feeling that they had made as many friends, or developed as close friendships as the hospital-based respondents. The responses from the independent School A tend to fall between those from Ryerson and the hospital-based schools both in terms of limiting their friends to their school of nursing and in terms of the type and number of friends they did develop.

B. Formal and Informal Activities

Part B of the *Activities Questionnaire* was designed to collect data on both the formal and informal activities undertaken by the students at the various schools of nursing. On the one hand, while schools such as hospital-based programs with students living in residence allow more time and opportunity for the development of peer relationships, they do not on the whole offer as many formal clubs, organizations and activities. On the other hand, a school like Ryerson, found in an educational setting, presents to the students as members of the school, a vast array of activities, formal and informal. These activities may be organized co-educationally or for women alone. How well do these students actually use the facilities available to them ? How much do they participate in school life ? How important are these clubs, organizations and activities to the students ?

To how many formal "clubs" do the respondents actually belong ? What type of club is considered to be most important? Five per cent of the Ryerson juniors and 16 per cent of the seniors belong to three or more clubs (as compared with 1-3 per cent of the other junior respondents and 0-6 per cent of the other senior respondents). Forty-one per cent of the Ryerson juniors and 37 per cent of the seniors do *not* belong to any clubs at all (as compared with 50-59 per cent of the other juniors and 49-60 per cent of the other seniors). The average number of clubs to which the respondents actually belong is just under one for the two hospital-based groups, just over one for the autonomous school, and nearly one and one-half

for the respondents from Ryerson. It should be noted, then, that while more Ryerson students join clubs than do other students, not only is the difference not significant, but also, at an autonomous School like School A, where far fewer clubs are available, nearly as many students are club members.

What is the nature of this "one" club to which the respondents belong? *What type of club activity is most important?* Not only does school setting seem to have no significant effect on the number of clubs to which the students belong, it also seems to be unrelated to the type of club which is considered to be important. The junior respondents prefer social clubs and are quite uninterested in political organizations. The seniors are scarcely more politically conscious but do consider a variety of "special interest" (i.e. camera, outing, etc.) and cultural and aesthetic clubs to be of slightly greater importance.

Apart from one club seeming more important than another, the question was posed *as to the importance in the student's life generally, of the formal and informal activities (apart from the planned learning experiences) which are specifically part of her school life.* Student and nursing associations or government and formal school clubs or organizations were seen by the respondents as having no real importance at all in the pattern of their daily lives. Informal activities such as discussions or gatherings were somewhat more meaningful, but were still rated lowest on the three point scale of "very", "somewhat" or "not too important". It would seem that while far more in the way of formal organizations are available to the Ryerson respondent, they do not play a more significant role in her life than in the lives of the other respondents.

Why did the respondents who joined the various organizations and/or clubs choose to participate? Approximately two-thirds of the respondents are involved because they simply enjoy the activity itself or the relationships and human interactions which the activity allows. Only a small per cent of both junior and senior respondents use clubs to learn, gain experience, improve themselves, benefit their careers or provide humanitarian services. These activities tend to involve the respondents from several hours per week to the occasional hour throughout the school year. And, with the exception of a slight decrease over time, there is little difference in the amount of junior and senior class participation.

Educational institutions frequently allot fairly substantial budgets for athletic facilities. *How many of the respondents take advantage*

of the athletic facilitie provided? While there is no significant difference in per cent of respondents who do not participate in any way in athletics (23% of Ryerson juniors as compared to 11-26% of the other juniors, and 31% of the Ryerson seniors as compared to 24-29% of the other seniors) more Ryerson seniors participate (19% as compared to 4-7% of the other respondents) in amateur competition and more juniors participate regularly on a daily or weekly basis than do other respondents (37% Ryerson; 16-24% other respondents).

Eighty to ninety per cent of all respondents felt that there had been some change in the pattern of their activities since enrolling in their school of nursing. Only a few (Ryerson : 5%; School A : 9%; School B : 14%; and School C : 18%) felt that their activities had become limited to their school of nursing; somewhat more (18-36%) felt they had curtailed activities in general; a fair number (39-58%) felt they participated in more activities and a great number (69-82%) felt that the change lay in the type of activity which interested them.

While student participation in clubs and organizations seems somewhat limited, *would the respondents have liked to have been more active if presented with the opportunity for more participation* (granting that lack of opportunity for the individual might be due to either lack of availability or lack of knowledge of existing facilities) ? Ryerson, which has more clubs, or organizations and activities available, has a significantly lower per cent of both juniors (as compared with Schools A and C) and seniors (as compared with Schools A, B and C) who would like to have engaged in activities other than those which they had already joined. Students from the other three schools, while not participating in a lesser number of activities even though they have fewer available to them, express much more interest in such clubs and organizations. Further, this wish for greater involvement in activities tends to decrease from junior to senior year, not only at Ryerson (where the difference between years is significant) but also at the three other schools. It would seem then while there is not any direct relationship between availability and participation, there is one between unavailability and the wish to participate and become involved.

The last area of inquiry relating to student life activities concerned the respondents' work patterns, that is, work not directly related to their nursing program. *They were asked whether or not they held jobs, and if so, why they work.* Significantly more Ryerson students, both juniors (64%) and seniors (50%) have part-time jobs than

do the other juniors (25-38%) and seniors (29-37%). However, while still half of the Ryerson seniors are working, the decrease in number from junior to senior year is significant. There is a small but non-significant change over time at each of the three other schools with more seniors than juniors working at Schools A and B, but less in School C.

As juniors most of the respondents who work are employed in a variety of part-time jobs, such as sales clerks, baby-sitting, etc. (Table 7). When they become seniors, however, most Ryerson

TABLE 7

ACTIVITIES QUESTIONNAIRE
DISTRIBUTION BY PER CENT OF PART-TIME WORK DONE BY RESPONDENTS BY CLASS AND SCHOOL, 1968-69

Part-time Work Pattern	Class	Per cent of All Respondents Ryerson	School A	School B	School C
Respondents working part-time	Jr.	64[2]	28	25	38
	Sr.	50[2]	37	29	31
Type of work :					
Nursing or nursing assistant	Jr.	14[1,3]	0[3]	4	8
	Sr	46[2]	10	4	10
Clerical or secretarial	Jr.	5	4	1	3
	Sr.	0	0	2	0
Philanthropic or volunteer	Jr.	5	4	6	9
	Sr.	0	4	7	4
Other (including sales, baby-sitting, etc.)	Jr.	41[2]	17	14	18
	Sr.	4	24	16	18

[1] Significant difference between Ryerson and School A.
[2] Significant difference between Ryerson and three other schools
[3] Significant difference between Junior and Senior classes.

respondents who work are employed in nursing-related jobs; few of the other respondents have such positions (50% of the Ryerson seniors work; 46% of the Ryerson seniors work as nurses or nursing assistants). Both the difference between junior and senior years at Ryerson and between Ryerson seniors and the other seniors is significant in this regard.

Why work and go to school at the same time ? Equally as many Ryerson juniors work because they like the job or they need the money (17%). As seniors, however, significantly more Ryerson respondents (than Ryerson juniors or than other seniors) work because they need the money (42%) and few because they like the job (8%). In comparison, about half as many senior students from the other schools work because they like the job (10%) as work because they need the money (18%). It would seem then that while most respondents work for the money, many do so because of the nature of the job itself; and, the greatest contrast between Ryerson and the other three schools lies in the fact that at Ryerson, where the students (and/or their guardians) are financially responsible for both educational and living expenses, more need the income of a part-time job and they usually find positions involving nursing functions.

In order to gain a broader picture of the student's life pattern, *the respondents were asked to approximate the number of hours spent on various activities per week during the academic year.* In comparing the responses of students from Ryerson and Schools A, B and C, students at Ryerson had more class hours per week both as juniors (17 as compared with 10-14 hours) and seniors (12 as compared with 3-8 hours), less clinical hours as juniors (15 as compared with 22 hours), but just about as many as senior students (approximately 23). The Ryerson student studies slightly more than do the students from Schools A, B and C, but there is little difference in the mean number of hours spent on social life, dates, general recreation, activities and leisure. Ryerson students, however, spend much more time travelling between their parents' homes and their living accommodations as students, between living accommodations and school, between school and the clinical area than the other respondents (Ryerson students : 11-12 hours per week; Schools A, B and C: 3-6 hours per week); and much more time working (Ryerson : 6 hours per week; Schools A, B and C: 1-2 hours per week).

It can be concluded that there is a difference in activity and friendship patterns, by school setting.[7] The Ryerson student has more friends and acquaintances apart from her nursing program; she travels and studies slightly more; she works much more. It cannot be concluded, however, that the Ryerson student takes full advantage of multiple opportunities offered in an educational setting. She does not participate to any significantly greater extent in clubs, organizations or athletics. One of the key differences among Ryerson

respondents and the respondents from the other three schools of nursing is that the former are satisfied with the facilities they use while the latter wish for activities and facilities not available to them. Other differences evolve out of the need for Ryerson students to work to meet financial obligations and the fact that residence accommodations which facilitate certain peer group relationships were not available to all Ryerson students.

It would seem that many of the major differences are dependent to a very great extent on whether the school does or does not (1) provide extensive residence facilities for students; (2) have a generally "free" life style and various co-educational programs; (3) provide the facilities for the development of a large number of formal clubs and organizations and the concomitant evolution of informal activities; (4) place the financial responsibility for their education on the shoulders of the students themselves (or their guardians). These four conditions are all, of course, conditions of the setting which houses the school of nursing.

2. *School Life Questionnaire*

When a student enrols at a school of nursing, she not only participates in planned experiences designed to teach her how to nurse; she is also subject to pressures in the school's environment, subtle or overt which emphasize different approaches to life. The curriculum through its planned experiences may indicate what she needs to know about nursing; her attitudes and her philosophy will help determine her responses to life situations — including those she encounters as a nurse.

The *School Life Questionnaire*[8] asks two main questions. First, *what specific "approach to life" do the students feel is emphasized at their particular institution?*[9] These various *directions* of emphasis form the "horizontal" dimensions of the instrument: (A) Humanistic, Intellectual and Cultural; (B) Humanitarian and Group Welfare; (C) Independent, Objective and Scientific; (D) Technical, Practical and Occupational; and (E) Interpersonal Status-Oriented. The second question is: *What are the main sources of this emphasis?* These are : (1) the Administrative Community; (2) the Academic Community; (3) the Professional Community; (4) the Student Community. These form the "vertical" dimensions (see Chart 2). The two interrelated sets of dimensions form a matrix of "emphasis" within the environment. Chart 2 shows this matrix of "sources of emphasis" and "direction of emphasis" with an example for each of the cross dimensions.

CHART 2

School Life Questionnaire - Matrix of Dimensions for School Life Questionnaire (with examples)

Sources of Emphasis	Direction of Emphasis (A) Humanistic Intellectual and Cultural	(B) Humanitarian and Group Welfare	(C) Independent Objective and Scientific	(D) Technical Practical and Occupational	(E) Interpersonal Status-oriented
1. *Administrative Community* a) rules and protocols b) facilities c) over all features	The school offers many opportunities for students to undertake and criticize important works of art, music and drama	This institution has a reputation of being very interested in group welfare	The atmosphere here encourages the student to do objective, independent and clear thinking	It is expected that the students be serious and purposeful about their studies as they are directly related to their careers	Formal rules and regulations have a very important place here.
2. *Academic Community* a) characteristics of faculty b) curricula c) instruction (methods, classroom, assignments, etc.)	Many courses are a real intellectual challenge	There are a number of faculty here who devote much of their time to community projects services or politics	Many instructors are engaged in research pertinent to their fields of specialization	While the faculty considers examinations important, it is competence in the work area which is deemed a genuine measure of the student's achievement.	The faculty here seems to consider itself well above the students.
3. *Professional community* a) clinical program (or experience) b) clinical facilities c) characteristics of professionals	The whole atmosphere in the clinical setting contributes to one's learning to value intellectual achievement.	No matter what else it does, clinical experience teaches responsibility for the welfare of others.	We are expected to plan our nursing care logically, (based on underlying principles)	The nurses generally are extremely competent technically and know the latest nursing procedures.	The head nurse expects everyone to stand up when she comes into the room.
4. *Student community* a) characteristics of students b) extracurricular activities c) informal student activities	The students consider their cultural interests an important part of their daily lives.	Many upper classmen take it upon themselves to play an active part in helping new students with problems or difficulties.	Students are interested both in the newest scientific developments and the use of scientific method.	Students here not only expect to develop ideals but also to express them in action.	Student life is really controlled by an important clique of upper class men.

The questionnaire attempts to measure the pressures of the environment on the respondents by presenting them with a series of items representing the various cross dimensions;[10] and asking them if these were generally "true" or "false" in terms of life at their school of nursing. Table 8 presents the mean scores for both junior and senior respondents at all four schools. As there is no significant difference between junior and senior classes at any of the schools, it may be concluded that whatever pressures are felt by the respondents, they tend to be fairly constant over the years of the nursing program.

The significant difference between dimensions within each school of nursing is shown at the bottom of Table 8. Table 9 shows the significant differences among the various schools, on the mean

TABLE 8
SCHOOL LIFE QUESTIONNAIRE
DISTRIBUTION BY DIMENSIONS* (DIRECTION AND SOURCE OF EMPHASIS), OF MEAN SCORES FOR JUNIOR AND SENIOR CLASSES, AT RYERSON AND SCHOOLS A, B AND C, 1968-69

Dimensions	Ryerson		School A		School B		School C	
	Jr.	Sr.	Jr.	Sr.	Jr.	Sr.	Jr.	Sr.
Direction of Emphasis								
A. Humanistic, etc.	17	17	11	13	12	13	14	10
B. Humanitarian, etc	22	22	22	22	25	24	23	22
C. Independent, etc.	23	23	20	20	20	21	21	20
D. Technical, etc.	23	24	24	22	26	25	24	23
E. Status-oriented	6	6	8	5	13	10	9	8
Community which provides Source of Emphasis								
1. Administrative	22	22	22	20	23	23	23	21
2. Academic	25	24	23	22	24	22	24	22
3. Professional	22	24	22	21	26	25	24	22
4. Student	22	22	18	19	23	23	20	18

* Significant differences between dimensions :
I : Direction of Emphasis
1) for all groups: Dim. A & B, C, D, E; Dim. E & B, C, D.
2) for all except Ryerson jrs.: Dim. C & D.
3) for Schools A, B and C jrs. and School B srs.: Dim. B & C.
4) for Schools A and B jrs. and School C srs.: Dim. B & D.
II: Source of Emphasis
1) for all groups except School B srs. : Dim. 2 & 4.
2) for all groups except Ryerson jrs. and srs.: Dim. 3 & 4.
3) for Ryerson and School B jrs. and srs.: Dim. 1 & 2.
4) for Ryerson jrs. and School B jrs. and srs.: Dim. 2 & 3.
5) for School A jrs. and School B jrs. and srs.: Dim. 1 & 4.
6) for School A srs. and School B jrs. and srs.: Dim. 1 & 3.

score for each dimension (difference between classes not significant). From Table 8 it can be seen that the respondents at the four schools of nursing do feel variation in the amount of pressure toward various outlooks. The respondents on the whole feel greater pressure toward the humanitarian, the objective and the practical outlooks, rather than to the intellectual or the status-oriented view of life. There is less variance in pressure by source, but there are still significant differences. Generally, the greatest pressure is felt at Ryerson and School A from the academic community at School C from both the academic and professional communities, and at School B from the professional community. As juniors the students from School A report the most inconsistency of pressures toward the various outlooks on life; as seniors, it is the students from Schools B and C. The Ryerson students as juniors and seniors tend to feel pressures emanating fairly evenly from the various sources of emphasis.

The data found in Tables 8 through 11 will be compared and contrasted by dimension, first the dimensions along the horizontal axis of the matrix (i.e. direction of Emphasis) and then along the vertical axis (i.e. sources of Emphasis). In order to understand better the process of influence some reference will be made to Table 10 which gives the sub-scores of the specific amount of influence from a particular group toward a particular outlook on life. For example, the score on A 1 is the amount of emphasis from the Administrative Community toward a Humanistic, Intellectual and Cultural outlook. Table 11 gives the mean deviation of sub-scores with each of the "horizontal" dimensions (direction of Emphasis) allowing for some index of consistency of approach among the various sources of emphasis.

Not only do Ryerson students, as compared with others, feel greater pressure toward the humanistic, the intellectual and the cultural (Dimension A) but the difference between Ryerson and the three other schools of nursing is significant (Table 8). The mean scores for Schools A, B and C are quite similar. In considering this dimension broken down into subdimensions in terms of the source of emphasis (Table 10), Ryerson students feel the main source of the intellectual approach is first their peers and then faculty. Schools A, B and C respondents locate this prime source in the Professional Community; with School C students seeing the faculty contributing equally as much emphasis. As table 11 indicates, the amount of deviation in responses, while tending to be low, remains equal or decreases from junior to senior year at the different schools. As juniors

TABLE 9

SCHOOL LIFE QUESTIONNAIRE
DISTRIBUTION OF SIGNIFICANT DIFFERENCES
BETWEEN RESPONDENTS AT RYERSON AND
SCHOOLS A, B AND C ON MEAN SCORES OF
ALL DIMENSIONS (DIRECTION AND
SOURCE OF EMPHASIS), 1968-69

Dimensions	Ryerson & School A	Ryerson & School B	Ryerson & School C	School A & School B	School A & School C	School B & School C
Direction of Emphasis						
A. Humanistic, etc.	Yes	Yes	Yes	No	No	No
B. Humanitarian, etc.	No	Yes	No	Yes	No	Yes
C. Independent, etc.	Yes	No	No	No	No	No
D. Technical, etc.	No	No	No	No	No	No
E. Status-oriented	No	Yes	Yes	Yes	Yes	Yes
Community which provides Source of Emphasis						
1. Administrative	No	No	No	Yes	No	No
2. Academic	No	No	No	No	No	No
3. Professional	No	Yes	No	Yes	No	Yes
4. Student	No	No	No	Yes	No	Yes

there is more variation at Ryerson than at the other schools but as seniors their responses are more similar, indicating that more of them feel the pressures very much in the same way. As indicated earlier Table 11 shows how much the strength of emphasis from the different sources (i.e. Academic Community, etc.) vary in pressuring the student in the direction of a specific approach (i.e. Humanitarian, etc.)

TABLE 10

SCHOOL LIFE QUESTIONNAIRE
DISTRIBUTION OF MEAN SCORES BY SUB-DIMENSIONS FOR EACH TYPE OF EMPHASIS ACCORDING TO ITS SOURCE, JUNIOR AND SENIOR CLASSES AT RYERSON AND SCHOOLS A, B AND C, 1968-69

	Ryerson		School A		School B		School C	
Sub-dimension*	Jr.	Sr.	Jr.	Sr.	Jr.	Sr.	Jr.	Sr.
A.1	4	4	3	3	2	3	3	2
A.2	5	4	3	3	3	3	4	3
A.3	3	4	3	4	4	4	4	3
A.4	5	5	2	3	3	3	3	2
B.1	5	5	5	5	6	6	6	5
B.2	6	6	6	6	6	5	6	6
B.3	6	6	6	6	7	7	6	6
B.4	5	5	5	5	6	6	5	5
C.1	6	6	5	5	5	5	5	5
C.2	6	5	5	5	5	5	5	5
C.3	6	7	6	5	6	6	6	6
C.4	5	5	4	5	4	5	5	4
D.1	5	5	5	4	5	5	5	5
D.2	6	7	7	6	7	6	7	6
D.3.	6	6	6	6	7	7	6	6
D.4	6	6	6	6	7	7	6	6
E.1	2	2	4	2	5	4	4	4
E.2	2	2	2	2	3	3	2	2
E.3	1	1	1	1	2	1	2	1
E.4	1	1	1	0	3	2	1	1

*Sub-dim.: A.1 refers to the amount of emphasis toward the Humanistic, etc., from the Administrative Community. A.2 refers to the amount of emphasis toward the Humanistic ,etc., from the Academic Community, etc.

TABLE 11

SCHOOL LIFE QUESTIONNAIRE
DISTRIBUTION BY DIMENSIONS (DIRECTION OF EMPHASIS) OF MEAN DEVIATIONS OF ALL FOUR SCHOOLS, JUNIOR AND SENIOR STUDENTS, 1968-69

Dimensions	Mean Deviation (of Results of Sub-Dimensions)							
	Ryerson		School A		School B		School C	
	Jr.	Sr.	Jr.	Sr.	Jr.	Sr.	Jr.	Sr.
A	.85	.35	.40	.35	.50	.30	.50	.50
B	.50	.50	.50	.50	.35	.50	.40	.50
C	.40	.75	.75	.00	.50	.35	.35	.40
D	.40	.50	.75	.75	.75	.75	.50	.40
E	.50	.52	1.00	.75	.75	1.00	.85	1.00
MEAN	.53	.52	.63	.47	57	.57	.52	.56

The direction of emphasis in Dimension B is toward an attitude of humanitarianism and group welfare. Both as juniors and seniors (Table 8) School B students feel the greatest pressure toward this outlook. School C students are second, but the difference between students from Schools A and C and Ryerson is not great. As Table 9 indicates, the only significant difference among schools lies between School B and each of the three other schools. This pressure toward humanitarianism and group welfare is emitted strongly and fairly consistently by all four sources, with only small variation within the sub-scores of the dimensions (Table 10). The academic and professional communities are seen as most influential in directing students towards a humanitarian outlook in all four schools, with a decrease in influence of the academic community at School B among senior students.

The third dimension from the horizontal axis of the matrix is the emphasis toward the independent, the objective and the scientific. Looking at Dimension C on Tables 8 and 9, it can be seen that while Ryerson students rank highest of the four schools, both as juniors and seniors, they are only signficantly higher than the students from School A. Table 10 which gives the sub-dimension results, shows the professional, academic and administrative communities as being equally powerful sources of emphasis toward the independent,

objective outlook. Ryerson students, as seniors, report a sharp decrease in the influence of the academic community and an increase in that of the professional community. This then leaves the professional community as the most influential source of the objective approach for senior students. The mean deviations (Table 11) for the two hospital-based schools, B and C, do not change much between junior and senior years. There is considerably more variation in the senior than in the junior responses from Ryerson, but a great deal less in senior than juniors from School A. It would seem then, that at Schools B and C the influence toward independence is constant from year to year. At Ryerson the pressure is less consistent in senior than junior year; at School A the pressure becomes more consistent as the respondents become senior students.

Dimension D refers to a technical, practical and occupational orientation. While School B students feel the greatest pressure toward this outlook, the students from the other schools also report strong pressure from the administrative community, with the other sources of pressure being fairly equal in influence. At Schools A, B and C, the emphasis from the academic community tends to diminish in strength in the senior year with the professional and student community remaining constant. At Ryerson, the academic community increases its influence over time toward the technical, practical or occupational. Table 11, which gives mean deviations as a measure of "source" variation within the dimension, indicates that the students from Schools A and B, particularly as seniors, feel the greatest variation in influence. But, Ryerson and School C students report fairly constant influence from the various sources of pressure.

The scores on Dimension E, pressure toward interpersonal, status-oriented outlook, are much lower than the scores on any of the other dimensions across all four schools of nursing. School B students feel the greatest pressure toward this outlook, with School C students coming second, then School A and lastly those from Ryerson. School B students score significantly higher on this dimension than any of the other three groups; Ryerson students score significantly lower than any of the others with the exception of the students from School A. As Table 10 indicates at Ryerson and School A, the greatest amount of this pressure comes from the administrative and academic communities. At schools B and C the greatest pressure seems to come from the administrative community, that is, the whole hospital; at School B, however, senior students also report fairly strong pressure in this regard from their faculty. Further, while this pressure toward a status-oriented outlook is also much higher at School B than at other schools, it does decrease between junior and senior years.

It is of interest that while this dimension is rated lowest among the dimensions, it shows the greatest amount of inconsistency in pressure from various sources (mean deviations, Table 11).

There are four possible sources of emphasis within the environment; the institution as a whole, the faculty and the curriculum, the nursing profession and the respondents' peer groups. As mentioned earlier, these comprise the vertical axis of the dimension matrix. Dimension 1, source of emphasis being the administrative community, includes consideration of the rules and protocols, facilities and generally all of the features of the school and the institution incorporating the school of nursing. While students from School B feel the greatest pressure from the administrative community as a whole, only the difference between Schools B and A is significant. While Ryerson and School B students feel constant pressure both as juniors and seniors in this regard, both School A and C students feel such influence decreases over time. These differences between junior and senior years, however, are not significant.

Dimension 2, the source of emphasis lying in the academic community, includes the characteristics of faculty, curricula, instruction including methods, classroom assignments, etc. While there is no significant difference among the groups, Ryerson, the nursing school in the educational setting, rates this area of influence higher than do any of the three other schools. However, while the academic community is the most powerful source of influence among junior students at Ryerson and Schools A and C (along with the professional community), its influence declines over time and by the senior year, it either shares with or is replaced by the professional community in the position of primary source of emphasis.

Dimension 3, pressure from the professional community, includes the clinical program or experience, clinical facilities and characteristics of the professionals. It is in this regard that students from School B feel the greatest pressure. As juniors, Ryerson and School A students report the least pressure, but as seniors, Ryerson students are second only to School B students in feeling pressure from the professional community. As Table 9 indicates, there is a significant difference between School B and each of the three other schools on this dimension.

Dimension 4, the student community as a source of emphasis, includes characteristics of the students, extracurricular activities, informal student activities. On the whole, the peer group seems to bring the least influence to bear on the students. School B students again

report the greatest pressure in this regard, Ryerson students next, School C and then School A students the least. The significant differences in this dimension are between students from Schools B and A, and between Schools B and C. This influence from the student body seems to stay fairly constant from junior to senior years at all four schools.

What can be said about the environmental pressure of the educational and professional institutions incorporating the various schools of nursing? In general there are significant differences in the direction of emphasis and in the sources of emphasis (toward an approach to life and to nursing) at the various schools of nursing. There was, however, no significant difference between junior and senior classes; and no significant pattern emerged of any specific source pressuring toward any particular outlook. The students generally felt the greatest pressure toward the humanitarian and toward the objective and practical outlook; least toward the intellectual and cultural and toward the status-oriented outlooks. Most strongly pressured toward the intellectual and the objective outlooks on life were the Ryerson respondents, but most strongly toward the humanitarian, the practical and the status-oriented approaches were the respondents from School B. In identifying sources of pressures, School B respondents reported the most influence from their administrative, professional and peer communities; Ryerson respondents from the academic community. The greatest pressure is generally emitted by the academic and professional communities, the least by the administrative and student communities.

It may then be concluded that the pressures from the environment toward an outlook toward life vary from one school of nursing to another as the setting changes[11] but tend not to change appreciably between junior and senior years at each school. It is these pressures which mold the personality and attitudes of the student and help determine how she will respond to her total life situation as an individual and to work situations as a nursing individual.[12]

3. *Nursing Approach Scale*

Nursing educators, when discussing aims and objectives, and nurses in general when expressing their ideas in the nursing literature, present descriptions of "today's" nurse, nursing and the preparation of nurses in terms of comparison and contrast with the "more traditional" nurse.[13] Qualities and characteristics of each are enumerated. These extrapolated and translated into behavioral examples form the basis of the *Nursing Approach Scale*.[14] The basic aim of the

questionnaire is to allow the construction of a "values picture" of any group of nurses so that different groups could be compared and contrasted on their approach to nursing, "Approach" in this instrument being a dichotomous concept lying along a continuum of "Traditional" to "Modern". [15]

The "values" of nurses found at each end of this scale were set up in pairs of conceptual correlates, one-half of the pair describing the "traditional" nurse ,the other half the "modern" nurse. The eight pairs of "conceptual correlates" or dimensions developed (Table 12) were represented by eighteen items, each of which had previously discriminated between groups of nurses held to be "traditional" and "modern" respectively.[16] It was taken as given that in any particular nursing situation, the nurse's course of action would, in great part, be determined by her values and attitudes. [17] Therefore, each pair of values (conceptual correlates) from the scale were represented by an item(s) which presented a nursing situation and two possible nursing actions, one based on the "traditional" value and one on the "modern" value. The respondents were asked to consider the situation and to indicate which course of action should be followed.

The following is a sample item representing a pair of conceptual correlates; the *well-trained* for the "traditional" and the *innovational* for the "modern" end of the value continuum.

The situation:

A graduate nurse moves to a new nursing setting. In order to contribute best to the efficacy of the situation, she would probably:

a) (the "Traditional" alternative)
Bring to the situation a good basic knowledge of nursing measures and techniques and show skill in carrying them out.

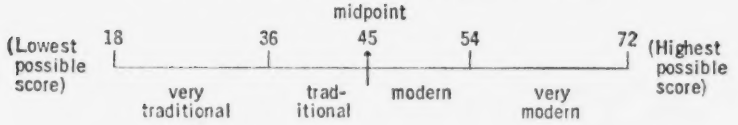
b) (the "Modern" alternative)
Combine her basic nursing knowledge with the stimulus of a new situation to suggest modified or alternate approaches to nursing care.

It should be remembered that not all possible values are represented in this scale, but only a sample, which emerged from frequent use in the literature and which "held up" under validation. Further, since this scale is essentially in a "pilot" stage, the information elicited is being used to expand and refine the instrument for future use, as well as to answer the underlying question: Is there a difference in the "values picture" in terms of a "traditional-modern" orientation between various group of nurses?

Each item was scored on a scale of one to four, from the "very traditional" to the "very modern" extremities of the scale. Since there were eighteen items, each respondent could potentially score from eighteen to seventy-two. Mean total scores were calculated for each group of respondents (as well as mean scores on each of the eight dimensions comprising the instrument). A total score of 18-35 was interpreted as indicating a "very traditional" outlook, that of 54-72 a "very modern" outlook. The scale was as follows:

DIAGRAM 2

INTERPRETATION OF NURSING APPROACH SCALE



Interval	*Limits of Intervals*
Very traditional:	18-35
Traditional-modern:	36-53
Traditional	36-44
Modern:	45-53
Very modern:	54-72

There is no significant difference among schools or between junior and senior classes at any of the schools on the cumulative mean scores of the *Nursing Approach Scale* (Table 12). The mean score of 44 for School C seniors being just below the midpoint of the scale, is the only score which does not fall within the "modern" interval of the scale. The student respondents generally then range from having a "modern" to "very modern" approach to nursing; but most are grouped just above the midpoint.[18]

While the total scores do not differ much from group to group, there are some significant differences, at the level of the eight dimensions included within the total scale (Tables 12 and 13). On the one hand, Ryerson juniors and seniors are significantly more "modern" than Schools A and C juniors and seniors in that they feel they should be more *responsive* than *attentive* in caring for patients; as seniors, they also rate being *permissive* (as compared to being *protective*) and being *imaginative* (as compared to being *efficient*) significantly higher than do the seniors from Schools B and C; as

TABLE 12

NURSING APPROACH SCALE
MEAN SCORES BY DIMENSION FOR JUNIOR AND SENIOR CLASSES AT RYERSON AND AT SCHOOLS A, B AND C, 1968-69

Dimensions Traditional-Modern	No. of Items in Dimension		Scores by Dimension Ryerson	School A	School B	School C
A. Attentive-Responsive	2	Sr.	6‡	5	6‡	5
		Jr.	6‡	5	6‡	5
B. Confident-Analytic	1	Sr.	3‡	3‡	3‡	2*
		Jr.	3‡	3‡	3‡	3‡
C. Well-organized Flexible	2	Sr.	5	5	5	5
		Jr.	4*	5	5	5
D. Well-trained Innovational	2	Sr.	5	6‡	6‡	6‡
		Sr.	5	6‡	5	5
E. Protective-Permissive	3	Jr.	8	9‡	8	8
		Sr.	9‡	9‡	8	7
F. Dependable-Accountable	4	Jr.	11	10	11	11
		Sr.	10	11	11	9*
G. Efficient-Imaginative	2	Jr.	5	6‡	5	5
		Sr.	6‡	6‡	5	5
H. Intuitive-Perceptive	2	Jr.	5	5	6	5
		Sr.	5	5	5	5
CUMULATIVE MEAN		Jr.	49	49	49	47
		Sr.	48	50	48	44*

*Scores falling within "traditional" interval of scale
‡Scores falling at bottom limits of "very modern" interval of scale.

juniors they believe being *analytic* (as compared to *efficient*) is significantly more important than do the juniors from School C. On the other hand, as juniors the Ryerson respondents are significantly less "modern" in terms of their rating of being *permissive* (as compared to *protective), imaginative* (as compared to *efficient*) and *innovational* (as compared to *well-trained*) than School A juniors as well as being more "traditional" in their evaluation of being *perceptive* (as compared to being *intuitive*) than School B juniors. As seniors they again feel that the nurse should be less *innovational* than the respondents from School A do and less *flexible* (as compared to *well-organized)* than all of the other senior respondents.

TABLE 13

NURSING APPROACH SCALE
SIGNIFICANT DIFFERENCES IN DIMENSIONS
BETWEEN RYERSON AND SCHOOLS A, B AND C,
FOR JUNIOR AND SENIOR CLASSES, 1968-69

		Ryerson-School A	Ryerson-School B	Ryerson-School C
A. Attentive-Responsive	Jr.	Yes^{H}	—	Yes^{H}
	Sr.	Yes^{H}	—	Yes^{H}
B. Confident-Analytic	Jr.	—	—	Yes^{H}
	Sr.	—	—	—
C. Well-organized-Flexible	Jr.	—	—	—
	Sr.	Yes^{L}	Yes^{L}	Yes^{L}
D. Well-trained-Innovational	Jr.	Yes^{L}	Yes^{L}	Yes^{L}
	Sr.	Yes^{L}	—	—
E. Protective-Permissive	Jr.	Yes^{L}	—	—
	Sr.	—	Yes^{H}	Yes^{H}
F. Dependable-Accountable	Jr.	—	—	—
	Sr.	—	—	—
G. Efficient-Imaginative	Jr.	Yes^{L}	—	—
	Sr.	—	Yes^{H}	Yes^{H}
H. Intuitive-Perceptive	Jr.	—	Yes^{L}	—
	Sr.	—	—	—

Yes^{H} means significantly higher.
Yes^{L} means significantly lower.

As either juniors or seniors, the Ryerson respondents rate themselves significantly higher (more "modern") on two dimensions and lower (less "modern") on five dimensions than do the respondents from School A; significantly higher on two dimensions and lower on three than School B respondents; and significantly higher on five and lower on two than those from School C. While then there is no significant difference in terms of mean cumulative scores, it would seem that in terms of their ratings on the individual dimensions within the *Nursing Approach Scale* the respondents from School A believe in a slightly more "modern" approach to nursing than that held by the respondents at Ryerson; those from School B an approach very similar to those from Ryerson; and those from School C less "modern" than that at Ryerson. It is of interest, however, that a change seems to occur on the various types of respondents working as graduates; for, on testing young Ryerson and young hospital graduates after about a year or more of being in the work world, the Ryerson graduate scored significantly more "modern" in her approach to nursing than the hospital graduates.[19]

In considering the rank order of the dimensions at the various schools, (Table 14) it would seem that as juniors Ryerson respondents rate highest a *responsive* and *analytic* approach and as seniors, they add to this *permissiveness* and *imagination*. At School A, both as juniors and seniors, the respondents agree with the seniors at Ryerson in giving a first place rating to being *analytic, permissive* and *imaginative,* but replace *responsiveness* with being *innovational.* As at Ryerson, School B's juniors and seniors rank *responsiveness* and being *analytic* higher, but as juniors also add being *innovational* and *perceptive.* The respondents at School C as juniors rate being *innovational* highest and as seniors, being *analytic.*

Is the question of difference in nursing approach viable in terms of the "traditional modern" dichotomy? The collected data[20] do not allow a definitive evaluation. It does seem, however, to indicate that further refinement and testing may yield valuable results which would help in understanding the individual's approach to nursing. This understanding could then help in the building of better relationships among nurses of various ages and backgrounds.

TABLE 14

NURSING APPROACH SCALE

RANK ORDER OF DIMENSIONS FOR JUNIOR AND SENIOR CLASSES AT RYERSON AND SCHOOLS A, B AND C, 1968-69

Traditional-Modern	Ryerson		School A		School B		School C	
	Jr.	Sr.	Jr.	Sr.	Jr.	Sr.	Jr.	Sr.
A. Attentive-Responsive	1.5	2.5	6.5	7.0	2.5	1.5	5.5	4.0
B. Confident-Analytic	1.5	2.5	2.5	2.5	2.5	1.5	8.0*	1.0
C. Well-Organized-Flexible	6.5	8.0*	6.5	7.0	7.5	6.5	5.5	4.0
D. Well-Trained-Innovational	6.5	6.0	2.5	2.5	2.5	6.5	1.0	4.0
E. Protective-Permissive	4.0	2.5	2.5	2.5	6.0	4.0	3.0	7.0
F. Dependable-Accountable	3.0	6.0	6.5	5.0	3.0	3.0	2.0	8.0*
G. Efficient-Imaginative	6.5	2.5	2.5	2.5	7.5	6.5	5.5	4.0
H. Intuitive-Perceptive	6.5	6.0	6.5	7.0	2.5	6.5	5.5	4.0

* The scores which these ranks represent fall within the "traditional" interval of the scale.

4. *Summary*

While many aspects of the friendship and activities patterns of the students from the various schools of nursing are similar, there are some marked differences. The number of friends and/or acquaintances varies little from group to group, but more Ryerson respondents date young men who are in some way affiliated with the institution housing the nursing program; and, more of these same respondents are married, both as junior and senior students. The friendship pattern which is most representative of Ryerson juniors is that of friendships with nursing and non-nursing students from their school as well as people from outside their school. As seniors, however, these respondents have changed somewhat and have become more like those from Schools A, B and C, where both junior and senior students feel that their friends are limited more closely to their nursing program and to people not connected at all to their school. Whoever these friends may be, the most important activities shared with them tend to be social. For the respondents from Schools A, B and C, residence life is also of major importance.

The respondents from Ryerson belong to slightly more clubs and formal organizations, but there is little difference in how important these activities are in the lives of the various groups of respondents. Most join activities because they like the activity itself or because they like the relationships the activity allows. There is, however, a very great difference in the per cent of students who desired to participate in activities unavailable to them. Where many activities are unavailable, more students want them. Further, there is also a significant difference between Ryerson and each of the other three schools in the higher per cent of Ryerson respondents who work and the higher per cent who work because they need the money. And, in comparing the mean number of hours devoted to various activities, major differences seem to lie in the extra number of hours the Ryerson respondents spend in travel, in working, and in class. The number of hours spent in general life activities is similar from group to group.

Do the nurses prepared in these different settings develop dissimilar approaches to life? Does the influence toward the various philosophical outlooks emanate consistently from the possible sources of such influence? The Ryerson students were pressured significantly more toward a humanistic, intellectual outlook than were any of the three other schools. While Ryerson students felt the greatest

part of this emphasis came from their peer groups and the faculty, the other students tended to locate this source in the professional community. However, in regard to a humanitarian, group welfare approach, School B students felt significantly more influence than the others. The prime source of emphasis here tended to be the professional community for School B students; and both the professional and academic communities for the others. While Ryerson students reported the strongest emphasis toward being independent and objective, the difference was only significant between them and the students from School A. And, while the sources of emphasis as junior students tended to be very diffuse, most students (with the exception of those from School A who keenly felt the influence of their peer group) saw the professional community as the most important source of influence.

Emphasis toward the technical, practical and occupational is strong at all four schools and therefore differentiates poorly among schools. School B students, however, score the highest; and (with the exception of Ryerson seniors who attribute the source of this outlook most to the faculty) most students again feel the professional community is responsible for this orientation. Finally, on an approach to life which is status-oriented, School B students score significantly higher than all other schools, and Ryerson students score significantly lower than all but those from School A.

What are the primary sources of influence at the various schools? The administrative community exerts greater influence at School B than at any of the other schools, and significantly more than at School A. The academic community is most (but not significantly more) influential at Ryerson. The professional community is a significantly greater source of environmental influence at School B than at the other three schools. The student community is the least influential of all sources and is significantly more powerful at School B than at Schools A or C. At Ryerson and at School A the prime source of influence is the academic community; at School C, it is the academic and professional communities, and at School B, it is the professional community. In the whole, then, while there is variety among the groups in both source and direction of emphasis, the greatest similarities seem to be between Ryerson and School A and between School C and School B. The trends or patterns are, however, more strongly emphasized at Ryerson on the one hand and in School B on the other.

This pattern of polarity between Ryerson and School A on the one hand and Schools B and C on the other, does not emerge from

the results of the *Nursing Approach Scale*. Here, while the juniors and seniors from Ryerson and Schools A and B and the juniors from School C fall somewhat above the midpoint of the scale and into the "modern" interval, the mean score for School C seniors, falls just into the "traditional" interval. The general "values picture" is then of a "modern" approach to nursing. When the pattern of results is next considered in terms of significant differences between groups on a dimensional level, School A respondents seem to be slightly more "modern" than Ryerson respondents in their approach to nursing, School B respondents similar, and School C respondents somewhat less "modern". There would seem to be some consensus among groups, in which "modern" characteristics of a nursing approach are most strongly favored; these include being *responsive, analytic, innovational, permissive, imaginative* and *perceptive*.

It may be concluded that there are differences in activity and friendship patterns, in outlook on life and in approach to nursing among the respondents from the four schools of nursing. Some of these differences could be traced almost directly to conditions within the school setting, for example, that many Ryerson students need to work for financial reasons. Others are difficult to explain without further data, for example, that the three other groups of respondents rate a flexible (rather than well-organized) approach to nursing higher than do Ryerson students. Some support widely-held assumptions, for example, that an educational setting will provide intellectual and cultural influences not available in a hospital setting; others tend to negate such assumptions, as for example, that the nursing student in an educational setting will reap the benefits of a wide range of activities, organizations and friendship groups. However ,these differences, whatever assumptions they may support or negate, are to some extent the effect of the internalization of the individual's experiences as a student nurse in a specific school of nursing — in a particular setting.

5. *Discussion*

The planned experiences, provided by a nursing program formalized into a curriculum and operationalized within the clinical field, are geared to the mastering of nursing skills and the developing of relationships specific to the nursing situation. But what of the other experiences, the unplanned activities and relationships which interact to become life as a student nurse? Do these contribute to the development of characteristics inherent in the student recruits? Do they

encourage the student as she is initiated into the profession to continue to develop as she has begun or do they tend to direct her into well-defined and socially accepted patterns? In the former case, there is a continued interplay of unplanned influences within a permissive atmosphere; in the latter, a certain isolation from uncontrolled or diverting influences within an atmosphere of defined expectations. A suspicion arises, however, that the former situation, while providing intellectual stimulation and the satisfaction of self-accomplishment, would only loosely define the role of the graduate in a work world which tends to be well-defined. On the other hand, while in the latter the individual would have the security of having mastered the norms and expectations of the role she is assuming, she might have done so with a completeness suffocating to her natural youthful curiosity and adventurousness. Further, the influence of faculty, peers and other professionals necessarily differ in a situation where the faculty is liaison between students and the profession, from one in which the professional acts as the model to be imitated.

There is, of course, a certain similarity among the patterns of unplanned experiences for the students from Ryerson and Schools A, B and C, for social, rather than intellectual or cultural activities are shared most commonly with close friends. Moreover, most students report a tendency toward isolation within their nursing life, and consequently their developing friendships and incipient professional lives tend to merge. Such a pattern, however, is much less pronounced at Ryerson than it is at School A and the two hospital schools of nursing. Does this variance in pattern of unplanned experiences (i.e those lying outside the formalized program) between Ryerson and the other schools provide an entry into the general problem of describing those unplanned experiences particular to the Ryerson student? A close inspection of relevant findings will show that this variance provides precisely such an entry.

More Ryerson students hold part-time jobs, primarily for financial gain. More spend their leisure time with friends away from their school of nursing. Fewer are dissatisfied with the facilities and relationships the school offer. Moreover, at Schools A, B and C, far more students look upon residence-life activities as the important ones to be shared with friends. More, as seniors, have limited their friends to those from their own nursing program and although a slightly smaller proportion belong to clubs and organizations, a much larger proportion wish they could join such clubs and organizations.

The environmental pressures apparent at the different schools of

nursing do not permit a straightforward dichotomous classification. However, the Ryerson students, who looked for a school with permissive regulations and a liberal program, and who made their choice of programs in the face of greatest opposition, report the greatest influence toward both the intellectual-cultural, and the independent, scientific approaches to life; they report being influenced least toward a consciousness of status in their relationships with others. The students who were supported most by family and society, those from both Schools B (who were motivated to choose nursing for society-benefitting reasons) and C (who were motivated to choose nursing for family-benefitting reasons) report that humanitarian and technical approaches to life are emphasized and that status and position are made to appear comparatively important in their environments. The students from School A, who were given strong support by their parents (many of whom were professionals) and who looked for academic excellence in their nursing program, did not feel as strong an influence toward an intellectual or independent outlook as the Ryerson students, nor as strong pressures toward a humanitarian or technical approach as in Schools B and C. The Ryerson students report that the greatest influence within their environment comes from their faculty, but students from School B and C feel it from the profession and from their institution as a whole.

These facts are closely interrelated. The Ryerson student has not thrown herself as totally into her educational environment. She has retained for herself a larger area of growth potential lying beyond the reach even of unplanned academic experiences. This area has developed through influences that are not specifically professionally oriented, planned or otherwise. Because this area in her life has tended to be larger than such areas in the lives of the students at Schools A, B and C, she has been less amenable to the totalizing stimuli which may or may not have been directed toward her at her school of nursing.

By working more outside the school, she has at times been the focus of influences that the others have not. Her friends have more often been chosen for reasons not necessarily connected with her Ryerson life. Thus she has tended to devote less of her total growth expectancy to her educational environment; and, consequently, she has beleived far less than the other students that her total growth experience ought to be derived from this environment. Accordingly she has not tended to be as critical of the unplanned experiences of her academic life as are the students in the other schools.

The effectiveness of an unplanned but well-defined educational

experience, it would seem, depends heavily on the readiness of the students to permit such defining. At Ryerson, *vis-a-vis* Schools A, B and C, the unplanned segment of the academic environment has tended to be undefined, largely because the students' own life style did not lend itself to defining. The students at the other schools, it would seem, have allowed themselves greater isolation within their schools and have enjoyed informal activities and experiences within better defined limits.

How then does a nursing program utilize the unplanned experiences of the educational environment as a student recruit moves toward professional stature? Should nursing programs, in preparing professionals through a multitude of educational experiences, maintain and emphasize the characteristics inherent in the student as she comes to the school of nursing? Or, should they try to mold the student through limiting and defining those experiences? Perhaps, however, considering that the different programs recruited differing groups of students, the line of inquiry itself is improper. Perhaps a more valid question could be asked: Do schools attract students because of the professional and educational characteristics of the nursing program? Do they allow a variety of expjeriences or limit them to those experiences that are congruent with the student nurse's expectations of the life style of the potential professional? Or do they limit them to those experiences which will contribute to the student's internalization of the ideal professional role inherent in the school's philosophy?

The findings also prompt other broader questions. How much influence from "outside" sources does the nursing profession want and how much can it allow in defining its role, developing its potential, and charting its future? "Outside" influence will be effective not only to the extent that the profession sees itself functioning in the community but more essentially to the extent that the profession has a "life style" which values and can in turn incorporate the richness of a diverse and changing environment. The profession can set strict limits on the experiences it defines as falling within its scope or it can reach a greater growth potential by being open to the wealth of "outside" influences which frequently seek to redefine and represent experience.

The profession procreates itself through its schools of nursing. Its progeny, however they are formed, are both its responsibility and its source of survival and growth. What they are and what they become is what the profession becomes. In recognizing the fruitfulness of outside influences in educating practitioners the profession

must choose to face the dangers of unknown experience and undefined change for the advantage of achieving maximum potential. Such a choice requires both courage and strength.

Footnotes (Chapter 5)

1 Both Katz in looking at change in college students [Joseph Katz et al, *No Time for Youth; Growth and Constraint in College Students* (San Francisco : Jossey-Bass Inc., 1968)] and Stern in his extensive work with college students and college environments [G. G. Stern, *Activities Index* (Syracuse: Syracuse University, Psychological Research Center, 1956) and G. R. Pace and G. G. Stern, *A Criterion Study of College Environments*, 1958] see data concerning the activity patterns of the college student as integral to the study of these respondents.

2 For development and validation of the *Activities Questionnaire* see Appendix.

3 In a pre-test of the *Activities Questionnaire* extensive material was also collected on the activities and friendship patterns of a group of university nursing students, half-way through, and again at the end of their nursing program.

4. Significantly fewer Ryerson juniors than juniors from the other programs selected this as their typical friendship pattern.

5 Different findings might emerge on the relationship of Ryerson students and residence life, as after the data for this study had been collected, female residence facilities were made available to a large number of the nursing students.

6 In discussing the socialization of the student nurse Williams [T. R. Williams and M. M. Williams, "The Socialization of the Student Nurse", *Nursing Research*, VII, No. 1. (Winter 1959), pp. 18-21] noted that the process of involvement and isolation of the student nurse within the nursing environment becomes greater over time. It seems that it occurs here to students in both hospital and educational settings, but more so to the hospital-based students.

7 In comparing the results from the university nursing students (see footnote ‡3) the following findings were significant:
The university students:
—"date" more students from their own school.
—selected more often, as their typical friendship pattern, that of themselves and non-nursing students from their school.
—had fewer friends in their own program over time.
—participated in more clubs and organizations.
—had more class hours, studied more, but had less clinical hours as juniors.
The total pattern of activities and friendships which emerged for these students was more similar generally to that of the Ryerson respondents than to that of the other three groups.

8 For development and validation of the *School Life Questionnaire*, see Appendix. This instrument was based on the work of Pace and Stern on college environment, [Pace, *A Criterion Study of College Environments* and C. R. Pace ond G. G. Stern, *College Characteristics Index* (Syracuse: Syracuse University, Psychological Research Center, 1956)].

9 Extensive study has been carried out in this important area of environmental press or emphasis based on the work of Pace and Stern; see, for example, D. L. Thistlethwaite, "College Environments and the Development of Talent"", *Science*, CXXX (1959), 71-76, and D. L. Thistlethwaite and N. Wheeler, "Effects of Teacher and Peer Sub-Cultures upon Student Aspirations", *Journal of Educationl Psychology*, LVII, No. 1 (1966), 354-362.

10 The dimensions which appear in the *School Life Questionnaire* were expanded and modified from those developed by Pace and Stern; see the discussion of their work in the chapter on "environmental press" [Howard S. Becker, "Student Cultures", *The Study of Campus Cultures*, ed. T. F. Lumsford, Papers presented at the 4th Annual College Self-Study (Ber-

keley: University of California, 1962)]. In order to make the instrument more appropriate for the study of student nurses, the dimensions of the horizontal axis (direction of emphasis) were expanded from four to five by separating the "Interpersonal, Status-Oriented" out from the "Independent, Objective and Scientific" dimension. A fourth vertical dimension (source of emphasis) was added: the "Professional Community". New items were added and many old items were modified or deleted. See the Appendix for a discussion of the development of the dimensions and for the validation of the items.

11 Becker, *ibid.* This paper includes a discussion of different influences at different universities.

12 For discussion of the effects of environmental pressure on the individual, see the work of Thistlethwaite and Wheeler. [Thistlethwaite, *Science*, CXXX (1959), and Thistlethwaite and Wheeler, *Journal of Educational Psychology*, LVII, No. 1 (1966)].

13 Some of the literature on change of approach to nursing and shift in nursing values is as follows: R. W. Habenstein and E. A. Christ, *Professionalizer, Traditionalizer and Utilizer* (Columbia, M.: Univerisity of Missouri Press 1955); G. R. Meyer, *Tenderness and Techniques: Nursing Values in Transition* (Los Angeles: University of California Institute of Industrial Relations, 1960); Lyle Saunders, "The Changing Role of the Nurse", *American Journal of Nursing*, LIV, (1954), 1094-1098; K. M. Smith, "Discrepencies in the Role-Specific Values of Head Nurses and Nurse Educators", *Nursing Research*, XIV, No. 3 (Summer 1965), 196-202.

14 For the development and validation of the *Nursing Approach Scale*, see Appendix.

15 For support of the concept of the "traditional — modern" dichotomy in nursing, see the works mentioned in footnote #3 as well as the work of Scott [W. R. Scott, "Some Implications of Organization Theory for Research on Health Services", *Milbank Memorial Fund Quarterly*, XLIV, No. 4 (October 1966, 35-39], where he discusses the setting of goals and tasks. Particularly apropos is his discussion of how a task conception is reached (p. 43) and his ideas concerning traditional and modern approaches. Warneche, in his Ph.D dissertation (R. B. Wareche, *Dropouts from Collciate Nursing: A Typological Study of Conflict*, Ph.D. dissertation Department of Sociology and Anthropology, Duke University, 1966) discusses the conflict between the professionalization of the traditional role (p. 7) and the conflict that arises with anticipatory socialization toward a more modern approach to nursing.

16 The group of nurses held to be "traditional" were represented by graduate nurses with approximately fifteen years experience who were working as private duty nurses in the hospital setting and who had had no post-basic education. The "modern" nurses were represented by graduating university students. For details of the validation process see Appendix.

17 This conceptual framework of the relationship between values and behavior forms the basis of much research; appropriate for consideration here is the work of Meyer and Hoffman (G. R. Meyer and M. J. Hoffman, "Nurses' Inner Values and Their Behavior at Work", *Nursing Research*, XIII, 3 (Summer 1954), 244-249).

18 See Chapter — for a discussion of faculty testing on the *Nursing Approach Scale*. The results are only partially complementary to those of the students. School A faculty, as School A students, scored the highest with 61. Next came those from School C and Ryerson with 58 and 57 respectively. Lowest was the School B faculty with 54. While all of the student groups score lower than their faculties, the major difference between students and faculty comes at School C, where the senior students' score (44) places them in the "traditional" interval, while their faculty falls into the "very modern" interval.

19 The Ryerson graduates have a mean score of 54.2 on the *Nursing Approach Scale* as compared to 49 for senior Ryerson students. See Chapter 10 for further discussion of the graduate results.

20 Data relating to the *Nursing Approach Scale* can also be found in Chapters 7 and 9.

PART II

THE STUDENT IN THE SYSTEM

CHAPTER 6

CHANGE AND DEVELOPMENT AS A STUDENT NURSE

What changes can the graduating student identify in herself? What was the source of these changes? What wished-for changes have not occurred? What experiences were meaningful to the graduating student? What now motivates her? How committed is the graduating student to the nursing profession?

1. *Self-Change as Seen by the Graduating Student*

Change occurs in the student over the years she is learning to nurse. Some of this change is external and obvious; some can only be identified by the student herself. It was in an attempt to determine the nature and extent of this latter type of change that the *Senior Questionnaire*[1] was administered to the respondents shortly before graduation from their school of nursing. This instrument was modified from one developed by Sanford to study the change process in university students.[2]

To answer the question, *How have you changed since you entered your school of nursing?*, respondents were presented with a list of specific changes which might have occurred over time. These are loosely grouped under the headings: *Personal, Academic/Professional Life, Social and Interpersonal* and *World Outlook and Attitudes.* Table 15, includes the per cent of respondents from each of the four participating schools, Ryerson, and Schools A, B and C,[3] who felt that change had occurred within themselves. On the whole, few of the respondents felt that they had not changed. The largest number identify personal, social and professional differences; the smallest number, changes in their general outlook on life. The most common personal changes, in more than 90 per cent of all respondents, are in the direction of increased self-confidence and independence, increased self-awareness, and greater maturity. However, significantly fewer Ryerson respondents, as compared with students from Schools B and C, feel that they have become more stable over time, and, while fewer

respondents generally feel that they have become happier and more tranquil or more outgoing, Ryerson respondents feel such change least of all.

While Ryerson respondents tend to report the least personal change, a different pattern seems to emerge in terms of their academic and professional life. Slightly fewer Ryerson respondents see themselves now as being more responsible, as having a more questioning attitude, or as having become more exacting than respondents from the two hospital-based schools. But more (and significantly more than from Schools A and C) Ryerson respondents now report increased intellectual curiosity and activity. In contrast, however, when the question was amended to: In what ways have you changed a great deal? significantly more students from Schools B and C, as compared with those from Ryerson and School A, felt that they had become much more efficient as students since entering their school of nursing.

Socially, slightly more Ryerson students feel that they have become more liberal and tolerant, but slightly fewer feel that they have developed an increased awareness of others. When the question is modified to *"In what ways you have changed a great deal?"*, more Ryerson students[4] report changed friendship patterns and increased freedom in expressing their feelings and desires.

The type of change which is generally least pronounced in all respondents, change in outlooks and attitudes, tended to occur least at Ryerson. Significantly fewer Ryerson students than those from Schools B and C feel that over time they have become more realistic, cynical or aware of the world; and, School A respondents feel, more than any of the others, that they have developed broadened interests since enrolling at their school of nursing.

What then are the changes that the students see in themselves over the years as student nurses? While the Ryerson students on the whole report less personal, social and attitudinal change than the other respondents, more of them do feel that they have developed an increase in intellectual curiosity, a much different friendship group and much more freedom to express their feelings and desires. The pattern of change which generally emerges is that the students from autonomous School A are more like those from the hospital schools B and C, than like those from Ryerson. The respondents from Schools A, B and C see themselves as having formed good relationships, become more efficient students, learned to take responsibility, developed self-confidence, and learned to view the world with realistic, if cynical, eyes. The student nurses about to enter the work world

TABLE 15

SENIOR QUESTIONNAIRE
DISTRIBUTION BY PER CENT OF WAYS IN WHICH SENIOR STUDENTS FROM RYERSON AND SCHOOLS A, B AND C FEEL THEY HAVE CHANGED SINCE ENTERING THEIR SCHOOL OF NURSING, 1968-69

How Students Have Changed	Per Cent* of Students Who Feel They Have Changed			
	Ryerson	School A	School B	School C
Little or no change	12	8	11	7
Personal				
More self-confident, poised and independent	92	92	96	96
More stable.	69[1]	83	89	90
Increased self-awareness and understanding	96	93	98	97
More outgoing and spontaneous	62	71	76	74
Happier and more tranquil.	54	62	67	65
More mature	96	92	96	99
Academic/Professional Life				
Increased intellectual curiosity and activity	96[2]	77	87	78
More exacting	73	60	78	77
More responsible	85	85	91	96
More questioning attitude	81	85	89	88
Social and Interpersonal				
Increased awareness of others and better relationships	92	96	96	99
More liberal and tolerant	96	83	89	92
World Outlook and Attitudes				
More realistic or cynical	58[1]	58	84	84
More awareness of the world.	77[1]	79	83	82
Broadened interests	77	85	73	80

* Per cents total to more than 100% in that most seniors identified more than one type of change.

[1] Significant difference between Ryerson and School B, Ryerson and School C.

[2] Significant difference between Ryerson and School A, Ryerson and School C.

from all four schools of nursing, see themselves as having moved in the direction of a more adequate self-concept and somewhat more realistic awareness of the world,[5] with, of course, differences in emphasis at the different schools, which allow variety in the pattern of development.

In an attempt to evaluate further the strength of self-concept developed by the respondents by the end of their nursing education, a series of questions used by Sanford were posed to the respondents. These were: *How satisfied are you with yourself? How often are you sick and/or depressed? What years in a person's life do you consider to be the happiest?* Sanford rationalized that frequent bouts of illness and depression were signs of a poor self-concept and being dissatisfied with one's self or having the feeling that periods far removed from the present were the happiest, would confirm this evaluation of self.[6]

In contrast with the 59 per cent of the female university students (Table 16) over 80 per cent of all student nurse respondents feel "reasonably" or "quite" satisfied with themselves just prior to graduation. While there is a general increase in the number of respondents feeling more satisfied with themselves at the end, as compared

TABLE 16

SENIOR QUESTIONNAIRE

DISTRIBUTION BY PER CENT OF HOW STUDENTS FEEL ABOUT SELF DURING FIRST SEMESTER AND AT THE END OF PROGRAM AT RYERSON, SCHOOLS A, B AND C AND FOR WOMEN AT STANFORD UNIVERSITY, 1968-69.

School		How Students Feel/Felt About Self			
		Largerly Dissatisfied %	Moderately Dissatisfied %	Reasonably Satisfied %	Quite Satisfied %
Ryerson	First semester	15	27	46	12
	At end of program	0	15	50	35
School A	First semester	20	27	39	12
	At end of program	6	4	67	23
School B	First semester	9	31	38	22
	At end of program	2	2	42	51
School C	First semester	25	25	41	10
	At end of program	1	18	62	20
*University	As Freshmen	16	27	37	15
(Women)	At end of program	7	31	50	9

*Katz, *Ibid.*

with the beginning of their program, the greatest change occurs at School A and at Ryerson. At the former 39 per cent and at the latter 37 per cent more of the respondents felt "reasonably" or "quite" satisfied with self as senior than as junior students. There was a 32 per cent increase at School B and only a 21 per cent increase at School C. The upward swing in self-satisfaction among the female university students in Sanford's study was only 7 per cent. It would seem that while there is little difference in the per cents of beginning nursing students and beginning university students who are "reasonably" or "quite" satisfied with themselves, the nursing students report much greater movement toward satisfaction than do the university students, in the time between first semester and the completion of their respective programs.

About 40 per cent of all respondents, including university students,[7] expect the years in their immediate future, from twenty-two to thirty-five, to be the happiest period in their lives; another 30-40 per cent believe that the years before they were twelve were the happiest. While a few look back on the years of adolescence as happiest, more respondents from Ryerson and from the university believe them to have been so, (Schools A, B and C: 6-9% university students: 11%; Ryerson students: 15%). While fewer look forward to the years after fifty, significantly fewer Ryerson respondents, as compared with students from Schools A, B and C, anticipate that the years from thirty-six to fifty will be happiest. Generally then, these students, whether university or nursing, look upon the years of adolescence as the most difficult, and those after fifty as the least interesting or joyful.

Forty to 54 per cent of all the students, including university women,[8] report feeling depressed a few times per month. But about 40 per cent of the student nurses as compared with 26 per cent of the female university students report being depressed only a few times per year, while 18 per cent of the female university students claim to have suffered from depression daily or several times per week. How often did these same students feel physically out-of-sorts during an average month, toward the end of their studies, with colds, backaches, cramps, fatigue, etc.? While over half of all respondents felt "out of sorts" only once or twice per month, those from School A, who moved furthest toward self-satisfaction, reported feeling physically ill significantly less often than other respondents during their last months as students. About 10 per cent of all respondents felt ill or extremely fatigued at least two to three times per month.

It would appear then, using the criteria of self-satisfaction and

feelings of physical and emotional well-being, that there is little difference among groups of student nurses in strength of self-concept; and, that this level of this self-concept is fairly high. Further, in comparing these results with those obtained from female university students, it would seem that the student nurses have a stronger self-concept.

What is (are) the source(s) of this change in the student which tend(s) to result in development of self? Such factors as the discovery of an earlier unrealized capacity, or ideas from either books or teachers, were identified as the source of "much" change by about one-third of the respondents and as resulting in "little or no change" by another third. Few, probably since all were expecting to graduate, felt that a lack of success in the nursing course had really influenced them. One-third to one-half felt strongly influenced by friendships with friends of either sex, but less than 20 per cent felt that participation in activities which were directed toward social or political improvement was responsible for much of the change which had occurred in them. Confrontation with problems of patients, however, strongly influenced one-third to one-half of all respondents.

Table 17 presents those sources of change which were generally most powerful or which varied most from group to group. About two-thirds of the respondents, excluding the students from School A, felt that self-understanding accounted for a great deal of their development and maturation, while over half attributed such change to confrontation with inner conflicts and problems. "Academic and/or professional factors"[9] differentiate between Ryerson and School A, since significantly more Ryerson students identified participation in student organizations and/or work experiences during the summer and/or learning to nurse in the clinical field as major sources of change. The latter, learning to nurse in the clinical field,[10] is particularly important to nearly two-thirds of the respondents at Ryerson and at the two hospital-based schools.

Many more of the Ryerson respondents live with their families, but significantly fewer feel that problems within their families greatly affected them. Further, significantly more respondents from all other schools identify factors such as being away from home and their living accommodations as crucial factors in the change process. Ryerson differs particularly from the two hospital-based schools[11] in that more Ryerson respondents attribute little or no change to crises in their relationships with others, and fewer of the Ryerson students feel that problems with faculty or nursing staff were of

TABLE 17 — SENIOR QUESTIONNAIRE

DISTRIBUTION BY PER CENT OF STUDENTS FROM RYERSON, SCHOOLS A, B AND C AND WOMEN STUDENTS AT STANFORD UNIVERSITY WHO ATTRIBUTE CHANGE TO SELECTED SOURCES, 1968-69

Source of change	Per cent of Respondents Attributing: Litttle or No Change to source					A Great Deal of Change to Source				
	Ryerson	School A	School B	School C	Univ.* Women	Ryerson	School A	School B	School C	Univ.* Women
A. *Personal Factors*										
1. Gaining understanding of myself as a person.	0	21	16	10	5	65	44	71	69	67
2. Confrontation with problems and conflicts in myself.	19	21	9	11	3	50	50	71	60	67
B. *Academic/Professional Factors*										
1. Participation in student organizations committees, etc.	42	55	40	55	65	23[2]	6	11	12	9
2. Work experience (e.g. during vacation).	27	50	27	25	40	54[2]	21	51	36	19
3. Learning to nurse in the clinical field.	0	12	9	6	—	65[2]	39	69	56	—
C. *Social and Interpersonal Factors*										
1. Problems in my own family.	30[1]	60	53	56	51	19	25	25	21	14
2. Being away from home.	62[1]	21	15	10	14	8[1]	44	71	69	40
3. Living facilities, shared accommodations, etc.	69[1]	15	16	12	27	4[1]	52	53	58	28
4. Crises in my relationships with other people.	42[4]	40	20	25	22	31	35	60	34	42
5. Problems with faculty, nursing staff etc.	19	40	20	25	—	19[4]	12	60	34	—
6. Close relationships with teachers or other adults.	8	40	44	20	35	31[2,3]	12	20	8	16

[1]Significant difference between Ryerson and each of three other schools of nursing.
[2]Significant difference between Ryerson and School A.
[3]Significant difference between Ryerson and School C.
[4]Significant difference between Ryerson and School B.
*Katz, ibid.

great influence. In contrast, however, more students from Ryerson than from the others schools [12] felt that much of their personal development was affected through their close relationships with teachers and other adults.[13]

What then were the most important sources of change at the different schools? Generally most change was effected in students, both nursing and university, through personal factors and human interrelationships; the student nurses engaged in a professional program tended to add the factor of learning to nurse in the clinical field. Among those factors that could be grouped as "social and interpersonal" the respondents from Schools A, B and C (which provide residence facilities) were changed the most by being away from home and by living in residence. The students from School B seemed to react most strongly to crises and problems in their relationships with other people, such as their faculty and nursing staff. Those from Ryerson, however, noted the effect of a close relationship with their faculty. School C respondents on the whole tended to feel influences from sources similar to those at School B, but apparently not as strongly. School A respondents differentiate themselves from all others (even though they are at times like those from Ryerson and at others like those from the two hospital-based schools) in that far fewer of them felt that much self-development resulted from either summer work experiences or learning to nurse in the clinical field. In conclusion, while the Ryerson respondents see activities and organizations as being more important in the change process than other respondents, the greatest influence toward change, for all respondents, seems to stem from personal and interpersonal factors rather than from academic, community or organizational interaction.

Did these student nurses wish for change(s) which did not occur? (Table 18). On the whole, respondents, particularly those from Ryerson and School A, seem to have achieved a sense of direction in life as well as a fairly adequate concept of self: For less than 30 per cent of these respondents wish they had developed a greater sense of purpose in life, while about 40 percent of them cannot identify any self-change they might have wished for that did not already happen. There is a significant difference between Ryerson and School C in this regard. The respondents from School C seem to be much more dissatisfied with themselves, in that only 18 per cent of them could say that they had no "wished for" self-changes.

While the greatest amount of change seemed to emanate from personal and interpersonal factors, the largest number of "wished

for" changes lay in the areas of academic, professional or community life. An exception to this generalization is in the large number of Ryerson students (54%) who would really have liked to have

TABLE 18

SENIOR QUESTIONNAIRE
DISTRIBUTION BY PER CENT OF STUDENTS FROM RYERSON AND SCHOOLS A, B AND C WHO WISHED FOR CHANGES IN SELF WHICH HAD NOT OCCURRED, 1968-69

Changes wished for:	Per Cent* of Students Who Desired Change			
	Ryerson	School A	School B	School C
Personal				
Greater self-confidence or poise	54	44	33	43
Greater sense of purpose in life	19	30	22	30
Academic/Professional Life				
Increased academic ability or interests	62[2,1]	37	38	75
Increased participation in activities	50	54	36	63
Increased professional ability or interests	65[1,2,3]	35	31	47
Social and Interpersonal				
Increased ability to form close relationships	23	35	20	22
To have formed better relationships (less conflict, etc.).	12	31	22	29
World Outlook and Attitudes				
Increased cultural participation and learning	54	52	47	69
Did not wish for any change	39[3]	33	40	18

[1]Significant difference between Ryerson and School A.
[2]Significant difference between Ryerson and School B.
[3]Significant difference between Ryerson and School C.
* Many respondents identified more than one "change" — per cents therefore total to more than 100%.

developed greater self-confidence and poise.[14] A large proportion of respondents from all four schools, however, would have liked to have developed increased academic and professional abilities or interests as well as increased participation in school, professional and cultural activities. However, as much as all groups long for change,

Ryerson respondents in particular were disappointed with their lack of development in the academic sphere[15] and wished for an increase in professional abilities or interests.[16]

TABLE 19

SENIOR QUESTIONNAIRE
DISTRIBUTION BY PER CENT OF STUDENTS WHO WOULD HAVE CHOSEN TO DO SELECTED THINGS DIFFERENTLY IF IT WERE AGAIN THE BEGINNING OF THE FIRST SEMESTER, FOR RYERSON AND SCHOOLS A, B AND C, 1968-69

Things Students Would Have Chosen to Do Differently	Per Cent of Students Who Would Have Done Things Differently			
	Ryerson	School A	School B	School C
Little or nothing.	23	31	27	33
Personal				
Change personal attitudes.	39	25	22	30
Academic or Professional Life				
Study harder, . . . read more.	81	62	73	75
Gone to a different school or university.	19	12	13	25
Try to take more or different courses.	27[1]	25	42	51
Not have chosen this career.	8	20	9	20
Social or Interpersonal				
More involvement.	73	60	64	69
Change living arrangement.	20	10	18	14

[1]Significant difference between Ryerson and School C.

Many students wish that certain changes had occured. What action, on their part, might have produced such change? They were asked : *If it were the beginning of the first semester again, what would you do differently?* While there is little difference among groups Table 19 is interesting in that it indicates that the things most respondents would have chosen to do differently are fairly incidental to their life style (i.e. study harder or become more involved) while few would have chosen another career, another school of nursing or other living arrangements. A paradox does arise in that while more students from School C, as compared with the others, would like to have changed more, School C still has the largest pro-

portion of respondents who would have done little or nothing differently as beginning students. Their desire for change would seem to take on a wishful quality when viewed in this light. In contrast to this general picture, significantly more School C respondents (51%) would have tried to take more or different courses. But at Ryerson, where this option might have been available to the students, only about a quarter of the respondents show such a retrospective desire.

2. *Meaningful Experiences, Valued Relationships and Personal Attitudes*

The graduating students felt that change had occurred within themselves. When they described the pattern of change (and its sources) attention was turned to the specific experiences that the respondents saw as truly meaningful. They were asked: *What type of experience(s) did you find most meaningful during the years as a student in your school of nursing?* A selected list of experiences

TABLE 20

SENIOR QUESTIONNAIRE
DISTRIBUTION BY PER CENT OF STUDENTS
FROM RYERSON AND SCHOOLS A, B AND C
VIEWING SELECTED EXPERIENCES AS
MEANINGFUL, 1968-69

Experiences	Per Cent * of Students Identifying Experience(s) as Meaningful			
	Ryerson	School A	School B	School C
1. *Experience meaningful to largest proportion of students*				
Friendship and personal relationships	65	69	64	67
2. Experience meaningful to *smallest proportion of students*				
Difficulties with nursing program	0	4	2	6
Political, social welfare or reform group	4	0	9	3
3. *Most contrast between experiences*				
A job	27[1]	2	9	10
Clinical experience	54[2]	15	33	38

[1]Difference between Ryerson and each of three other schools significant.
[2]Difference between Ryerson and School A significant.
* Many respondents identified more than one experience — per cents therefore total to more than 100%.

was presented to them, ranging from love and marriage through other human relationships, such as life as a student, organized activities, or living arrangements to clinical experiences or a job. Table 20 shows the experiences which allowed the greatest contrast between groups as well as those which were the most meaningful to both the largest and the smallest proportion of respondents.

It can be seen that the experiences identified as meaningful most frequently, friendship and personal relationships, and least frequently, difficulties with the program and community-oriented groups, are consistent with the pattern of change and source of change which the respondents described earlier. [17] Further that significantly more Ryerson respondents identify a job as their most meaningful experience is not unexpected in light of the fact that significantly more Ryerson respondents held jobs as students. [18] Lastly, significantly more respondents from Ryerson than from School A looked back on their clinical experience as really meaningful; School A respondents, it may be noted, were the least enthusiastic in their anticipation of clinical experience as beginning students. [19]

If these experiences were indeed meaningful, it should be assumed that they left their mark on the lives of those experiencing them. The respondents were therefore asked *what they believed were the effects of these meaningful experiences.* Table 21 shows the effects felt by both the largest and smallest per cents of students. Not included in this table, but felt by one to two-thirds of the respondents were reactions such as achieving more awareness of the world, a better sense of purpose in life, broader interests, a happier and more contented outlook, and increased self-discipline or organization. While more than 80 per cent of all the respondents saw meaningful experiences resulting in greater insight into self or others, and increased self-confidence or poise, significantly more Ryerson students than students from School A reported the former outcome and significantly fewer Ryerson students than students from Schools B and C reported the latter. Few respondents, particularly from Ryerson and School B, related disenchantment, depression or disorientation directly to the more meaningful experiences of their lives as student nurses.

Relationships differ not only in terms of the support and understanding they provide, or problems and crises they encompass, but also in terms of the amount of disagreement they provoke. *How often did the respondents find themselves in a position of serious*

TABLE 21

SENIOR QUESTIONNAIRE
DISTRIBUTION BY PER CENT OF STUDENTS FROM RYERSON AND SCHOOLS A, B AND C FEELING EFFECTS ON THEIR LIVES FROM MEANINGFUL EXPERIENCES, 1968-69

Effects on Life :	Per Cent* of Students Feeling Effect			
	Ryerson	School A	School B	School C
1. *Effects felt by largest percent of students*				
Greater personal insight	100[1]	83	96	97
More insight into others or better relationships	92	86	93	92
Increased self-confidence or poise	77[2]	80	96	89
2. *Effect felt by smallest percent of students:*				
Disenchantment, depression or disorientation	12	17	9	20

[1]Significant difference between Ryerson and School A.
[2]Significant difference between Ryerson and School B.
* Many respondents, identified more than one "effect" — per cents therefore total to more than 100%.

disagreement with other groups of people? (Table 22) Frequent and serious disagreement with either male or female friends and with their respective nursing faculties are fairly uncommon. But the Ryerson respondents, who did not see problems with their parents as a central factor in the process of change within themselves, disagree significantly more with their parents than do any of the other groups of respondents. Further, they are involved in significantly more disagreements with nursing service staff than are respondents from either of the two hospital schools of nursing. This general tendency of Ryerson respondents to be more involved in disagreements than the other respondents is further exemplified by the range of respondents who stated that they "never" had serious disagreements with other people (Table 22). While as many as 29 per cent of the respondents from School C never found themselves in a position that was directly opposed to that held by other groups of people, only about 12 per cent of the Ryerson students made the

same claim. The Ryerson respondents, of course, saw themselves as agreeing least with their parents in choosing a school of nursing.[20] This pattern of willingness to state and defend their own opinions would seem to have continued on through their years as student nurses.

TABLE 22

SENIOR QUESTIONNAIRE
DISTRIBUTION BY PER CENT OF STUDENTS FROM RYERSON AND SCHOOLS A, B AND C DISAGREEING FREQUENTLY WITH OTHER GROUPS OF PEOPLE, 1968-69

Other Groups	Per Cent of Students Disagreeing* Frequently With Other Groups			
	Ryerson	School A	School B	School C
Friends of same sex	19	19	9	18
Friends of other sex	12	12	9	16
Your parents	46[1]	23	22	23
The nursing faculty	8	4	7	13
Nursing service staff	35[2]	27	13	16
Mean	24	17	12	17

[1]Significant difference between Ryerson and each of three other schools of nursing.

[2]Significant difference between Ryerson and School B, Ryerson and School C.

*Range of per cent of respondents who "never" disagreed with other groups: Ryerson: 12-13%; School A: 15-23%; School B: 16-31%; School C: 18-29%.

A final question relating to the relationships developed by the respondents, was: *If you could choose one person, contemporary, historical of fictitious, whom you particularly admire, who would it be?* It might be expected that students from educational institutions, like Ryerson (or a university) influenced both by community life, and courses in the social sciences and the humanities, would learn to admire political or public figures, artists, writers or fictional characters. However, when the per cents are summed up over these categories (Table 23) the cumulative per cent of respondents who particularly admire these types of persons are: 60 per cent from School A, 58 per cent from School C, 43 per cent from School

TABLE 23

SENIOR QUESTIONNAIRE
DISTRIBUTION BY PER CENT OF STUDENTS FROM RYERSON, SCHOOLS A, B AND C AND WOMEN AT STANFORD UNIVERSITY WHO PARTICULARLY ADMIRE SELECTED TYPES OF PERSONS, 1968-69

Persons Admired:	Per Cent of Students				
	Ryerson	School A	School B	School C	University Women*
Political or public figure	12	27	27	21	25
Artist or writer	8[1]	29	14	27	4
Fictional character	4	4	2	10	5
Friend or relative	39	29	56	35	—
Teacher or instructor at your school	39[2]	12	2	8	6

*"Others" and no response included a high per cent of university reponses.
[1]Significant difference between Ryerson and School A, Ryerson and School C.
[2]Significant difference between Ryerson and each of the three other schools of nursing.

B, 34 per cent from the university and only 22 per cent from Ryerson. Close to 80 per cent of the Ryerson respondents admire friends, relatives or teachers most; significantly more Ryerson respondents choose their teachers as figures worthy of particular admiration. The respondents from School B overwhelmingly chose their friends and relatives, but few seem to hold their teachers in such high esteem.

How do these young women, still maturing, still developing, but at the threshold of a professional career, *value various needs and motives? Is this valuing congruent with what they believe is their faculty's and the general public's view of such needs and values?* A list of needs and motives were presented to and rated by the respondents. The ranks assigned to each need were calculated on the basis of the per cent of respondents who rated each of these needs and motives first in importance in their lives. Love and affection or emotional well-being were ranked first at all schools of nursing; self-respect, knowledge and achievement followed in that order. Wealth or fame and recognition were considered by all to be of least importance. The ratings assigned to "being accepted and liked by

others" seems to differentiate among groups. While it is fifth or sixth in importance at Schools A, B and C (and fourth at the university, where curiosity and knowledge are rated only seventh), it shares a tenth and last place rating at Ryerson with such needs as wealth and recognition.

It might be concluded that the students are not particularly worldly wise or cynical, placing love and emotional well-being at the top of their list and wealth and fame at the bottom. Are they, however, perceptive enough of recognized differences between their views and those of others? The correlations between personal and the projected views of faculty and general public tend to be very high, with the mean correlations over all needs and motives ranging from .88 to .95. Generally, the correlation between student and faculty views are higher than between those of student and the general public. At Ryerson the students feel that their faculty does not consider love and affection to be as important as they do, and rates curiosity and knowledge higher than they do. The general public, they believe, would rate being liked and accepted by others higher, but emotional well-being lower than they do. The respondents from Schools A, B and C, however, feel that a realistic picture of the world is one in which wealth, fame and recognition are held in higher esteem than they personally hold such needs and motives.

3. *Personality and Maturation*

To complement the material presented earlier, both in terms of the expectations of students entering the nursing profession and of experiences they encountered and changes they felt through the three years, an indirect measure of maturation seemed important. Although the objectives of this project did not seem to warrant full scale personality testing, some other indication of the development within the personality of the students, over a three-year period, promised to be of value. Compromise was made following the lead of Professor Sanford from the book *Growth and Constraint in College Students.*[21] The twelve items of the complex personality test (developed for that study) in which Sanford's respondents showed the greatest change over time, were used here as part of this study. These were given to the nursing students, first on beginning their studies as student nurses, and then just prior to graduation; they were asked to consider the items and then to indicate whether they agreed or disagreed with each of them. The results of the analysis of a partial instrument such as this cannot be regarded as conclusive but they do highlight some of the differences between beginning and senior

students in terms of inner patterns of rigidity and control. Sanford himself uses the items in this way in his first chapter.

> In examining those items in our personality scales that show a great amount of change (20% or more) we find a trend toward greater acceptance of impulse, a relaxation of rigid or punitive controls, greater assertion of independence, less of a tendency to self-blame and greater readiness to look for objective conditions rather than magic or moralizing, in accounting for misfunctioning and destructiveness. [22]

The list of items (Table 24) are considered by Sanford to be representative of these value trends. While the items are not evenly distributed through a series of distinct dimensions, they can be grouped under three general headings: I, "independence versus discipline", II, "impulse versus rigidity or self-blame", and III, "readiness to look for objective conditions".

Four items are grouped together under the first heading, *Independence versus discipline.* The first is : "In the final analysis parents generally turn out to be right about things". Between first and final years only the Ryerson respondents, and those from the university, show a decrease in agreement with the statement. (See Table 24 for difference between beginning and graduating students in per cent of respondents agreeing with items.)

It would seem that the students from Schools A, B and C have become more interested in and dependent upon their parent's feelings and ideas while the Ryerson students, like those from the university show decreased dependence in this regard. For the second item, however, "I am quite independent from family rule", there is a general decrease in per cent of accord across all of the schools of nursing. And, while nearly 90 per cent of all beginning nursing students agree with the statement, "What youth needs most is strict discipline, rugged determination and the will to work and fight for family and country", none of the Ryerson and only 19-28 per cent of the others still agree as seniors. There is also a general decrease in per cent of agreement over time, with the statement, "We should respect the work of our forefathers and not think that we know better than they did".

It would seem then that there is change in all four schools of nursing, that is, movement toward independence rather than toward dependence and further integration with the family. The major exception to this generalization lies in the increased per cent of

TABLE 24

SENIOR QUESTIONNAIRE
PER CENT OF CHANGE IN STUDENTS' AGREEMENT WITH ITEMS SELECTED FROM PERSONALITY SCALE, FROM FIRST[1] TO LAST YEAR OF PROGRAM AT RYERSON, SCHOOLS A, B AND C AND WOMEN AT STANFORD UNIVERSITY, 1968-69

	Per Cent Change				
	Ryerson	School A	School B	School C	University Women[2]
I *Independence vs. Discipline*					
1. In the final analysis parents generally turn out to be right about things.	17	58[3]	62	71	24
4. I have been quite independent and free from family rule	34	34	47	31	11
7. What youth needs most is strict discipline, rugged determination and the will to work and fight for family and country.	96	63	67	63	29
11. We should respect the work of our forefathers and not think that we know better than they did.	46	48	33	33	11
II *Impulse vs. Rigidity or Self-Blame*					
2. No weakness or difficulty can hold us back if we have enough willpower	50	23	37	34	23
8. A person who lets himself get tricked has no one to blame but himself.	23	25	60	45	14
12. Most people don't realize how much of our lives are controlled by plots hatched in secret places.	27	42	51	40	11
III *Objective Conditions vs. Moralizing*					
3. Human passion causes most of the evil in the world.	38	62	69	50	47
5. No man of character would ask his fiancée to have sexual intercourse with him before marriage.	69	60	76	62	41
6. I dislike women who disregard the usual social or moral conventions.	61	91	82	82	39
9. The surest way to a peaceful world is to improve people's morals.	31	30	62	59	26
10. Most of our social problems could be solved if we would somehow get rid of the immoral crooked and feeble-minded people.	50	63	71	73	11

[1]Information regarding the "first year" respondents was collected on the *Introductory Information Questionnaire.*

[2]Results from Katz *ibid.* p. 74.

[3]Indicates changes is increase, (all other changes are a decrease in %).

respondents from Schools A, B and C, who place further reliance on their families' judgments. In terms of a ranking of per cent of difference of opinions between beginning and graduating students, Ryerson shows the most change, then School A, School B and lastly School C. While there is variety in the direction and amount of change, these results, as well as those that follow, might be considered in light of a statement made by Sanford in his interpretation of similar results.

> The trends just noted suggest that even though for many students certain values remain quite stable, there may be quite a difference in the ways in which these are held. Students may maintain the same general orientation and yet be more flexible and tolerant in the way in which they express it. Hence when different studies have come to different conclusions concerning degree of change during college, this may in part be due to their tapping different aspects of values and the way in which they are held and expressed. At the same time we must always keep in mind that the desire for and the rate of change varies considerably with different students . . . .
>
> One of the vexing problems in trying to ascertain a person's values is that conflicting and even contradicting values may be held by the same individual on different levels of the personality.[28]

The pattern of agreement-disagreement with the items, which might be grouped under the heading, *Impulse versus rigidity or self-blame*, shows a general movement away from "rigidity and self-blame". While the students who are attracted to Ryerson tend to be among the lowest in terms of "rigidity and self-blame", they show the least change over time. For example, while 57.7 per cent of the beginning Ryerson respondents, as compared to 57.7-84.4 per cent of the others, agreed with the item, "A person who lets himself get tricked has no one to blame but himself", there is only a 23 per cent change of opinion over time at Ryerson as compared to 25-60 per cent change elsewhere. The pattern is similar for the other two items (Table 24). If change then is considered in terms of per cent of agreement with these statements, the greatest movement toward impulse and away from rigidity is to be found first at School B, then School C, School A and lastly at Ryerson.

The final group of items might be included under the heading, *A greater readiness to look for objective conditions rather than magic or moralizing*. While 60-75 per cent of the beginning students agree with items such as "The surest way to a peaceful world is to improve people's morals", 92-99 per cent agree that they "dislike women who

disregard the usual social or moral conventions." While the differences generally between nursing and university students do not seem marked, the item, "Most of our social problems could be solved if we would somehow get rid of the immoral, crooked and feeble-minded people" offers great contrast with beginning students. While 77-94 per cent of the students recruited to nursing schools agree with it, only 20 per cent of the university recruits do.

In considering all five items included in this last grouping, it would seem that more beginning students at Ryerson held a more objective point of view. However, it appears that there has been greater movement toward this position of objectivity, in the other three schools of nursing, than at Ryerson. This is consistent with the pattern of change which emerges over the twelve items; the mean per cent of change at School B is 30 per cent, at Schools A and C, 27 per cent and at Ryerson, 21 per cent. The exception, of course, to this pattern was found in the first grouping of items through which the Ryerson respondents showed the greatest movement toward independence.

The general pattern of these results is somewhat similar to those found in testing university students, with a trend toward acceptance of impulse, a relaxation of rigid or punitive controls, greater assertion of independence, and a greater readiness to look for objective conditions.[24] It would seem that the students from Ryerson and School A, who are initially less moralistic and rigid, but do not move as much over time as do the hospital- based students toward positions of objectivity and freedom of impulse, are most similar to these university students in initial response and amount of change. Ryerson students, however, move more toward self-control and away from outward discipline than do the others.

4. *Facing the Future: Commitment to the Nursing Profession*

The students being discussed in this chapter are close to graduation from their respective schools of nursing. They are thought ready to take up the responsibilities and practise the skills of the professional nurse[25]. *How committed are these students to a career in nursing?* The *Commitment to Nursing Scale* was developed in an attempt to find the answer to this question.[26] It contains fifteen items included within five dimensions: (1) Choice, (2) Awareness of the Future, (3) Involvement Intrinsic and (4) Extrinsic, and (5) A Sense of Responsibility. The students responded in terms of their strength of agreement with each statement. Chart 3 contains these dimensions and series of sample items.

It was hypothesized that the Ryerson senior student, having chosen a new program in an educational setting, would prove to be more committed to the nursing profession, particularly in terms of the process of choice of her profession. Table 25 shows the mean cumulative score and mean dimensional scores for each of the four schools of nursing. There is a significant difference at the .05 level between Ryerson and School A, and Ryerson and School C, while the difference between Ryerson and School B is only significant at the .10 level on a two-tailed test of significance. However, a one-tailed test, on which all results are significant at the .05 level, would seem justified in that it was originally hypothesized that Ryerson students would score higher on the *Commitment Scale* than students at the

CHART 3

SENIOR QUESTIONNAIRE
DIMENSIONS, ASPECTS OF THE DIMENSIONS AND SAMPLE ITEMS OF THE COMMITMENT TO NURSING SCALE

Dimension	Aspects of the Dimension	Sample Items
I Choice	— decisions and plans — relationship between nursing choice and the rest of one's behavior — willingness to undergo training or hardship	1. Nursing will continue to be my career choice despite the difficulties and disadvantages involved (i.e. poor hours, etc.)
II Awareness of the future	— ramifications of choice and actions — planning for the future	2. A career in nursing is attractive and promising
III Personal (Intrinsic) Involvement	— personal achievement — ego development and involvement — actualization of self	3. There is no incongruency between marriage and a successful career in nursing
IV Professional (Extrinsic) Involvement	— professional status — career valued — interest in the profession	4. The theory and practice of nursing are both interesting and challenging
V Sense of responsibility	— to self — to clients — to the profession	5. Standards of nursing care are maintained through the nurse's sense of personal integrity and professional ethics rather than through external sanctions

three other schools of nursing. As Table 25 indicates, the mean score for Ryerson was 46 as compared to 41 from School B, 39 for School A and 18 for School C.

Dimension I, *Choice*, asks such questions as: When students make a choice of nursing as a career, do they realize what is involved in such a choice? Are they willing to take the necessary training, and are they willing to undergo the hardships necessary to achieve their end? It can be seen that of the four schools, Ryerson is highest on this dimension, with a score of 13 as compared to scores of 10, 11 and 5 from the other schools. It would seem that Ryerson students have made a more definitive choice with greater realization of the relationships between their total life and the profession. School A does not, as was hypothesized, fall between Ryerson and the two hospital

TABLE 25

SENIOR QUESTIONNAIRE
DISTRIBUTION OF SCORES ON COMMITMENT TO NURSING SCALE BY DIMENSION, FOR ALL FOUR SCHOOLS OF NURSING, 1968-69

Dimensions	Mean Scores Ryerson	School A	School B	School C
I Choice	13	10	11	5
II Awareness of future	6	4	5	5
III Involvement (intrinsic)	8	8	7	5
IV Involvement (extrinsic)	6	6	6	5
V Sense of responsibility	9	9	9	3
MEAN	46	39	41	18

schools on this dimension; rather, it shares the middle position with School B. School C had a score of only 5 on this dimension, which is considerably lower than any of the three other schools.

Ryerson has the highest score on Dimension II, but there is less variation among the four schools than in Dimension I. However, the hypothesis that School A's score would fall between Ryerson and the two hospital schools was not upheld, with School A scoring the lowest on this dimension. This second dimension, *Awareness of the Future*, asks the questions: Do the students realize the ramifications of their choice, and have they made plans for the future concerning their career? While the difference is not great, Ryerson students would seem to be more aware of such ramifications and have thought more of their plans for the future.

Dimension III, termed *Involvement (Intrinsic)*, asks the questions: Do the students have a feeling of achievement concerning nursing? Do they feel that self as a woman (or ego development) is congruent with nursing? And finally, do they feel that they can develop a sense of identity in nursing. The pattern of responses for Dimension III is similar to that of Dimensions I and II; again Ryerson students score the highest. In this case, however, this first place is shared with the students from School A, with those from School B and then School C showing lower scores.

Dimension IV, *Involvement (Extrinsic)*, asks: Do the students ascribe to nursing a professional status, do they value nursing and do they find the profession interesting and/or stimulating? While on the intrinsic level the Ryerson students shared the highest score with students from School A, on the dimension of extrinsic involvement first place is shared with both Schools A and B. Students from School C again score the lowest. It cannot be concluded that Ryerson and School A students are highly involved personally in terms of ego development achievement and actualization of self, while students from the two hospital schools, particularly School C, are somewhat less so. Ryerson students share with Schools A and B an intense involvement through being interested in, and ascribing value and professional status to, nursing. The students from School C seem considerably less committed in this regard.

The last Dimension, *A Sense of Responsibility*, asks the questions: Do these senior students feel a sense of responsibility as professional to themselves? Do they feel a sense of responsibility as professionals to their clients? And finally, do they feel a sense of responsibility to the profession itself? Table 25 shows that Ryerson and Schools A and B again share first place with a score of 9. School C is again considerably lower with a score of only 3. It would seem, then, that students from School C do not feel the same responsibility in terms of self, clients and the profession as do those from Ryerson or Schools A and B.

In conclusion, Ryerson students score highest on the *Commitment Scale*, with the greatest differences being found in Dimensions I and II, the *Choice of This Career* and the *Awareness of the Future*. While these same students maintain the highest scores in the three other dimensions, they share this first place either with School A or with both Schools A and B. These latter schools both score very high on *Involvement*, both intrinsic and extrinsic, and a *Sense of Responsibility*. School C, which is rated much lower than all of the other

schools on a total score, shows consistently lower scores on each one of the dimensions. These results would support the original hypothesis that the students from Ryerson, in being career-oriented (which is supported in other sections of this report), would tend to be even more highly committed than students in the other three schools of nursing. The second hypothesis, that the independent school of nursing, School A, would fall between Ryerson and the two hospital schools is only partially supported, in that it scores higher or the same as School B on some dimensions, but falls between them on the mean cumulative score.

5. *Creativity in Nursing*

The role of the nurse is changing[27] with a trend toward the development of a professional who is both responsible and creative. The *Creativity in Nursing Scale* attempts to measure one aspect of creativity in problem solving. Specifically, it looks first at the *Reasons* for behavior nurses offer in describing factors leading up to hypothetical nursing situations, and secondly, at the type of further *Activity* the nurse feels that the situations warrant.

The number of responses identified as *Reasons* may be viewed as similar to Guilford's notion of "fluency" which he says is largely a matter of retrieval of information from one's memory store or recall of stored information.[28] It is not creativity in itself but is one of the conditions needed for creative problem solving. Further, the responses suggesting *Activities*, whether in the form of "investigation" or "action" relates to Guilford's concepts of divergent and convergent thinking. Divergent thinking is speculative in that it 'takes off' from information already possessed. Convergent thinking, on the other hand, uses information to converge upon an already existing answer.[29]

The data, that is *Reasons* and *Activities*, are analyzed in terms of frequency of responses; and the respondent's approach to future action is assessed to determine whether she would investigate further or whether she would take a particular action on the basis of the evidence available. It is postulated that the person who asks further questions to learn more about a situation will be open to a wider range of solutions, and possibly more creative action, than the person who moves rather quickly to a particular course of action.

This type of instrument measures only one aspect of the process of problem solving, it does not consider the solution reached.[30] This position may be justified in that educators need to be concerned with facilitating creative problem solving, and this involves a study of the

process itself. This process may be related to creativity in applied science with experiments now being set up to identify people who are truly "independent" or "fluent".[31]

The two situations to which students were asked to respond, along with examples of their responses, are as follows:

I SITUATION

Mr. Salinger is a 42-year-old college professor in hospital with the diagnosis of leukemia. He is in a single room, and the night nurse reports that he has asked that no one come in, except when they have something specific that needs to be done.

(a) Write as many different ideas as you can think of, about what might have led up to this situation occurring.

(b) What would you do?

SAMPLE RESPONSES

(a) *Reasons given:*

"He is pondering about what is going to happen to wife and family."
"He does not like nursing personnel."
"Too many interruptions have interrupted his chance to rest."
"He may want to do work on his own."
"He is depressed, — in despair — withdrawn."

(b) *Activities:*

1. Investigation Suggested
   "Try to find out why no one is wanted in the room."
   "Observe reactions to treatments."
   "Try to discover why he has retreated."
2. Action Stated
   "Respect his wishes not to be disturbed."
   "Have each nurse tell her reason for entering his room."
   "Encourage radio, TV to keep his mind occupied."
   "Move him in with another patient."

II SITUATION

Mrs. Jablon, aged 67, has diabetes. She is acting very strange this morning, — she says someone is trying to hurt her; she's afraid of white uniforms; she won't eat because there is something wrong with the food.

(a) Write as many different ideas as you can think of, about what might have led up to this situation occurring.

(b) What would you do?

SAMPLE RESPONSES

(a) *Reasons*

"She is becoming senile."
"She had a bad dream."
"Previous unpleasant staff relationships."
"She may be hypoglycemic."

(b) *Activities*

1. Investigation
"Approach her to see what is bothering her."
"Ask her what she thinks is wrong with the food."
"Try to see what she has had done to her recently."

2. *Action*
"Give her orange juice to drink."
"Provide a dark quiet environment to keep her at rest."
"Explain why uniforms are worn."
"Get her something to eat she won't be suspicious of."

Reliability of scoring was achieved by clear and simple rules for scoring and by rescoring of a sample of answer sheets.[32] In the first section each *Reason* was counted; there was rarely any problem of duplication or overlap. For *Activities* each point given was counted and categorized as either "further investigation" or "action". Repeated tabulation gave essentially the same scores.

Responses to the questions were obtained from students in two classes of seniors at Ryerson, from two classes, intermediate and senior, at School A, and from one class of seniors at School B.[33] Table 26 shows a decreasing number of responses to problem nursing situations from Ryerson to School A to School B. One may note across all schools a diminishing number of responses from the category of reasons, to that of action, to that of investigation. In studying the activities suggested by respondents, the number of times investigation was mentioned as the first activity was recorded. The last column in Table 26 provides the ratio of investigation as first activity to the total number of first activities, i.e. investigation and action combined.

Investigation preceding action as the first activity occurred more often at Ryerson than in the other two schools.

A one-way analysis of variance was performed to assess whether the scores were in fact different for the students in the three nursing programs. For purposes of statistical analysis the two groups of Ryerson

TABLE 26

MEAN NUMBER OF RESPONSES GIVEN BY STUDENTS TO NURSING PROBLEM SITUATIONS AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Students	Activities			Ratio of Investigation to Action
	Reasons	Investigation	Action	
Ryerson				
Seniors I N=7	9.3	3.4	6.4	1:2
Seniors II N=14	9.28	2.43	6.0	
School A				
Intermediates N=44	8.6	2.4	4.34	
Seniors N=52	8.09	2.36	5.02	1:2.1
School B N=42	7.47	1.81	4.17	1:2.3

seniors were considered one group. As either class from School A included a sufficient number of students, it was decided not to combine the two groups as the total number of cases would be disproportionate compared with the Ryerson sample. The intermediate class was selected because it tested slightly higher than the seniors on two of the dimensions. Tables 27, 28 and 29 indicate the results of the analysis of variance for the categories of response, — "Reasons Given", "Investigation Suggested" and "Actions Stated" respectively for students in the three nursing programs. The results demonstrate that there is a significant difference among the three groups of students for all types of response to nursing problem situations.

In responding to nursing problems, Ryerson students give more reasons to explain the situation than do students in the other two schools. In deciding what to do in a problem situation, they identify

TABLE 27

ANALYSIS OF VARIANCE OF THE NUMBER OF REASONS GIVEN IN RESPONSE TO NURSING PROBLEM SITUATIONS BY STUDENTS AT RYERSON AND IN SCHOOLS A AND B, 1968-69

Source of Variation	Sum of Squares	df	Variance Estimates	F
Between	52.03	2	26.02	3.88*
Within	697.56	104	6.71	
Total	749.59	106		

*F .95 (2,104) = 3.09

TABLE 28

ANALYSIS OF VARIANCE OF THE NUMBER OF INVESTIGATIONS SUGGESTED IN RESPONSE TO NURSING PROBLEM SITUATIONS BY STUDENTS AT RYERSON AND IN SCHOOLS A AND B, 1968-69

Source of Variation	Sum of Squares	df	Variance Estimates	F
Between	21.16	2	10.58	4.15*
Within	265.27	104	2.55	
Total	286.43	106		

*F .95 (2,104) = 3.09

TABLE 29

ANALYSIS OF VARIANCE OF THE NUMBER OF ACTIONS STATED IN RESPONSE TO NURSING PROBLEM SITUATIONS BY STUDENTS AT RYERSON AND IN SCHOOLS A AND B, 1968-69

Source of Variation	Sum of Squares	df	Variance Estimates	F
Between	74.52	2	37.26	6.89*
Within	561.99	104	5.40	
Total	636.50	106		

*F .95 (2,104) = 3.09

more avenues for investigation and suggest a greater number of courses of action than do other students.[34] In addition, Ryerson students more frequently suggested investigation in preference to action as the first activity to undertake in responding to nursing problem situations. In summary, Ryerson students create a greater number of responses to nursing problems than do other students, and secondly, they are more apt to find varied solutions to nursing problems owing to the emphasis they place on investigation.

6. *Summary*

In summary then, what has happened to the senior nursing students over time, as students in their schools of nursing ? They have, on the whole, developed a more adequate self-concept. They wish for better relationships with others but generally do not wish they had done things too differently from what they did. The groups which live in residence feel the greatest source of change is their living arrangements and their peers. The Ryerson students, who tend to live on their own or with their families, see the greatest change in terms of self and the greatest source of change in terms of individual relationships with others such as teachers and/or other adults.

What changes do the students wish for ? All would like to have been more active and have had better study habits. Ryerson students are notable in their wish for a greater degree of self-confidence. What would the students do if they could do things differently in their first semester ? Clearly they would study harder and longer. They would have become more involved in all kinds of activities. Very few would have made any major changes in either their choice of careers or schools of nursing.

While most of the respondents emphasize the crucial nature of human relationships, the Ryerson students also tend to look upon their jobs as truly meaningful experiences and they are joined by students of the two hospital schools in feeling this way about their clinical experiences. Whatever specific experiences were considered meaningful they led to greater insight into self and others rather than to disenchantment or depression.

The Ryerson student, on the one hand, disagrees more with her parents and the nursing service staff than do the other students, but, on the other, she sees her nursing faculty with whom she has close contact, as respresenting the type of person she admires most in contrast to public figures, artists or fictional characters. All the respondents identify human relationships as crucial to the process of change, value love and affection along with emotional well-being

and the maintenance of self-respect as the most important of human needs and motives, but consider wealth, fame and recognition as least important.

The personality development which occurs within these nursing respondents, as within university students,[35] is movement toward a greater readiness to look for objective conditions rather than moralizing. The respondents from the two hospital schools seem to be more dependent, rigid and less objective than the students from Ryerson and to some extent, School A, but on the whole they show more movement toward objectiveness and reduction of self-blame.

These same students who have identified personal development within themselves have also developed professionally. The Ryerson students would seem to be most committed to the nursing profession and score highly, particularly on the dimension *Choice*. The other schools, especially Schools A and B join Ryerson with a fairly high rating on *Awareness, Involvement* and a *Sense of Responsibility*.

When measured on "creativity in problem solving" Ryerson students gave more reasons to explain nursing situations, identified more avenues for investigation and suggested a greater number of courses of action than do the other students. It would seem then that they would be better able to find varied solutions to nursing problems because of the primary emphasis they place on investigating nursing situations.

The change, then, that had occured in these students who were just about to graduate from their schools of nursing, is in the direction of personal development and realization. There are, however, differences, some of which are significant, in type and in source of change, from setting to setting.

7. Discussion

Change in student behavior may be a spontaneous maturation and development, or it may have been induced through appropriately planned experiences. It may be understood and identified by the individual undergoing such change or it may be a complex, covert and unrecognized process. What changes result from the interplay of the characteristics of the nursing recruit as a person, with the experiences and relationships constituting her life as a student nurse? Are the more important changes and sources of change, as identified by the graduating students, predictable in terms of their nursing programs and the settings which house them ? Such predictability would of course permit the ordering of experiences toward planned professional and/or personal ends.

The graduating student, on the brink of a professional career, is about to undertake responsibilities that require mature judgment as well as professional skill. It might be expected that schools with differing philosophies who initially attracted students with differing attitudes will produce practitioners who will vary in their approach to and in their subsequent practice of nursing. These differences may well be beneficial to the profession, permitting the generation of novel and possibly creative approaches through the interaction of graduates with a variety of philosophies, techniques and aspirations. However, as graduates from any professional education program end student life and prepare to enter the work world as adults, certain questions come into prominence. Is the environment proper to that program conducive to change that is closely integrated with and assists in the normal maturational process of early adulthood ? While the more traditional program has developed expectations of appropriate behavior and thus views the practice of the profession as occurring within well-defined limits, the more permissive type of program encourages spontaneity and intellectual curiosity and allows the professional character to be defined in terms of an ongoing process. Can both be successful in helping students to approach maturity, to develop their individual potential, to relate as an adult in an adult world and to identify their adult role through commitment to a profession ?

The former type may well permit the individual to search for a personal identity within the security of a well-defined professional life, the latter encourages an outlook and attitudes which may promote exploration and possibly growth but in a milieu possessing the uncertainty of a poorly conceptualized professional role. The one sets strong limits which might well provoke the natural restlessness and rebelliousness of late adolescence, the other lacks definitions which provide a base to the natural insecurity of early adulthood. In any educational process the role of adults generally, and in the case of a formalized program, the role of the faculty specifically, is necessarily a crucial one. As the expections of the situation varies the role of the instructor must vary. The former situation permits her to play model and judge, the latter, that of interpreter, resource person and counselor. Which set of interrelationships between student and instructor allows the student to learn best to relate as an adult to another adult ?

What changes can the students identify as having occurred in themselves over time ? What have been the major sources of such change? The graduating student, whether from Ryerson or Schools

A, B or C, on the whole attribute the most important changes which they have felt within themselves to personal and interpersonal factors rather than to professional or formalized sources. While change seems generally to emanate from a source common to the different schools of nursing, the type of change effected in the student seem to vary with the setting of the school of nursing. At Ryerson the graduating student reports that she has developed increased intellectual curiosity and freedom to express herself, but confesses that she suffers from a lack of self-confidence. She has made different kinds of friends than those of her high school days and has become even more independent than she was as a young student. She attributes these changes mainly to her close relationships with faculty and other adults, to her clinical experiences with patients, and to her part-time work. While she reports more overt disagreement with hospital staff than do the other students, she identifies faculty, friends and relatives as the figures she admires the most.

The graduating student from School A feels that she has developed broadened interests and reports being quite satisfied with herself and with her profession. She too believes that she has become somewhat more independent, although not to the degree of the Ryerson graduate. The students from Schools B and C feel that they have become more confident, objective and efficient, less rigid but more cynical and realistic. All three groups identify residence life and relationships as a major source of change; the graduating students as Schools B and C also mention their clinical experiences but only those at School B add crises in their relationships with faculty. All three groups indicate that they admire certain friends or relatives, those from Schools A and B add artists, political figures and fictional characters. The graduating student from School C (in particular) and School B long for additional changes that did not occur; those from Ryerson (in particular) and School A are less dissatisfied with the change and development that has occurred within themselves as students.

While the sudents from one school or another would have done various things differently, if given the chance of beginning over again, such as studying harder or becoming more involved, very few would have chosen another career or an alternate school of nursing in which to pursue that career. Can this be interpreted as anything but the development of commitment to an occupation, a process that is important in the self-identification of the young adult ? The Ryerson graduating students, who made their original choice of career with the least support of family and community

scored the highest on a scale which quantified this notion of "commitment". Their rating higher on total "commitment" score can be attributed in great part to the extremely high score they achieved, as compared with others students, on that dimension of the scale relating to the process of choosing a career. It would seem that all of the students are committed to the nursing profession. At Ryerson one particular aspect of "commitment", the choice process seems to have become emphasized because of the pressures of life experiences.

The maturational process within the individual can be hindered, perverted or aided by the individual's life experiences. The kinetic factors making up life as a student nurse can provide the support and direction to move more quickly and less painfully toward maturity. To function as a professional the individual has to have mastered the skills of her profession, plus be able to make mature judgments. The final part of this formula is not possible unless she has matured as a person. What are the elements and compounds into which this part of the formula can be analyzed ? To which educational environment are these elements indigenous and plentiful ? As the graduate from the educational setting prepares to enter the work-world she feels that as a student she has developed insight, intellectual curiosity and the ability to relate well to adults in the professional world. The graduates from the other programs, on the whole, feel that they have become more confident, efficient and realistic but see their relationships with others marked with crises. All are about to become practitioners in an occupation filled with tradition, regulations and external discipline but which is, at the same time, struggling to become a profession. Such professionalization necessitates the practitioner or professional to discipline herself, formulate plans of action and exercise judgment within an area of individual competence.

If nursing is to move from occupation to profession, a process analogous to maturation in the individual must take place. Nursing has evolved an area of competence, well-defined traditions and many rules for itself. Just as the individual, while not wishing to reject the wisdom of her elders, feels she must find a life of her own, so too the profession without disregarding the achievements of the past must define a new life for itself. Just as the individual, upon maturation, appropriates to herself the wisdom of the past, not so that the past will be idly remembered, but so that she will make her choices with knowledge and confidence, so too the nursing profession, if it has matured, will appropriate to itself the achievements of its past, not so that they will be idly remembered, but so that the

profession will make its choices with knowledge and confidence. As the mature individual will make her own choices and plan her own life, accepting the ramifications of these choices and plans, a true profession will make changes and plans for the future realizing its responsibilities and its potentials.

Footnotes (Chapter 6)

1 For development and validation of instrument see Appendix.
2 This instrument was modified from a more extensive questionnaire developed by Sanford for the study of college students, see Joseph Katz, ed., *Growth and Constraint in College Students: A Study of the Varieties of Psychological Development* (Stanford, Calif.: Stanford University, Institute for the Study of Human Problems, 1967), p. 81, Questions #58-74. Parts of Sanford's original questionnaire were deleted or modified because they were covered by other instruments in this study, or because they were not appropriate for the study of student nurses.
3 Data were collected from respondents at Ryerson, a school in an educational setting; School A, an antonomous school; and Schools B and C, schools in a hospital setting; for a more extensive discussion of the character of these institutions, see Chapter 1. Some of the latter tables also include the results (where appropriate) from one group of female university students (Katz, *ibid.*) to allow further comparison and contrast While four groups were originally used by Sanford (i.e. male and female students from two different universities), the part of his sample presented here does not differ significantly from his total sample and being composed of post-high school female students, allows comparison with the population of this study.
4 The difference is significant only between Ryerson and School A.
5 These conclusions are complementary not only to those reached by Sanford in his study of college students (Katz, *ibid.*, pp. 1-122) but also are apposite to Lehman's work (see I. J. Lehmann, B. K. Sinha, R. T. Harnett, "Changes in Attitudes and Values Associated with College Attendance", *Journal of Educational Psychology*, LVII, 2 (1966), pp. 89-98) where he points out that college seems to act as a catalyst in speeding up the normal maturing process. The graduating college students had become less dogmatic, less traditionally oriented and more outgoing and liberal.
6 Katz, *ibid.*
7 Katz, *ibid.*
8 Katz, *ibid.*
9 The grouping of individual "sources of change" was introduced in Table 17 for ease of analysis but was not used originally by Sanford (Katz, *ibid.*)
10 "Learning to nurse in the clinical field" is an example of an addition to the original questionnaire developed by Sanford (Katz, *ibid.*) for the purpose of making it more appropriate for the study of student nurses.
11 The difference is significant only between Ryerson and School B.
12 The difference is significant only between Ryerson and Schools A and C.
13 It is interesting to note that in the data collected by the *Expectations and Experiences in Nursing Questionnaire* (see Chapter 4) it was found that fewer Ryerson respondents than respondents from the three other schools particularly looked forward to developing a relationship with their faculty. The Ryerson students seemed originally to expect less of such relationships.
14 It was discovered through interviews with young Ryerson graduates and their head nurses (see Chapter 10) that both saw the young Ryerson graduate's lack of self-confidence as problematic in her functioning as a staff nurse.
15 Significantly more Ryerson respondents than respondents from Schools A and B long for change in the academic sphere, but the per cent of respondents from School C surpasses even the per cent from Ryerson in longing for such change.

16 Significantly more Ryerson respondents than respondents from Schools A, B and C wished for an increase in professional abilities or interests.
17 See Tables 15 and 17 of this chapter and the accompanying analysis. analysis.
18 See Chapter 4.
19 See Chapter 4.
20 See Chapter 4.
21 Extensive personality tests were given as part of a series of tests done on students at Berkerley and Stanford over a four-year period. The personality test developed and used was extremely long and somewhat complicated to administer. However, the results of these personality tests given to a part of the Stanford sample show a decrease in rigidity and punitive controls over time. The items which show the greatest change were extracted and presented in the first chapter of the book where change in the students was discussed (Katz, *Growth and Constraint*, pp. 74 and 72).
22 Katz, *ibid.*, p. 72.
23 Katz, *ibid.*
24 These findings are complemented not only by those of Sanford (Katz *ibid.*, pp.72-74) but also by Jacob's work in the same general area; see P. E. Jacob, *Changing Values in College: An Exploratory Study of the Impact of College Teaching* (New York: Harper Brothers, 1957).
25 See Becker's work on the young adult entering the work world (H. S. Becker, "Personal Changes in Adult Life", *Sociometry*, XXVII (March 1964), pp. 44-58, and H. S. Becker and J. W. Carper, "The Development of Identification with an Occupation", *American Journal of Sociology*, LXI, (January 1956), pp. 286-298), where he discusses whether or not the socialization process has produced an individual goal who is oriented and committed.
26 Much of the literature on commitment is worthy of note, particularly that of Sr. Vaillot, (Sr. M. C. Vaillot, *Commitment to Nursing: A Philosophical Investigation* (Philadelphia: Lippincott & Co., 1962); four authors contributed directly to the building of the *Commitment to Nursing Scale* (see H. S. Becker, "Notes on the Concept of Commitment", *American Journal of Sociology*, LX, (July 1960), pp. 32-40; F. Davis and V. Oleson, "Initiation Into a Woman's Profession: Identity Problems in the Status Transition of Coed to Student Nurse", *Sociometry*, XXVI, No. 1 (March 1963) pp. 89-101; N. Mayes, M N. Schultz and K. M. Pierce, *Nursing Outlook*, XVI (July 1968), p. 29. Natalie N. Riegler, "Commitment and Nursing" (unpublished paper, School of Public Health, University of Michigan, 1967).
27 The article by Mussalem is only part of much literature published on this topic; see H. K. Mussallem, "The Changing Role of the Nurse", *American Journal of Nursing*, LXIX, No. 3 (March 1969), pp. 514-517.
28 Guilford, "Creativity", American Psychologist, V (1950), pp. 444-454.
29 Guilford, *ibid.*
30 It might be useful in further studies of this sort to look also at the quality of reasons given, particularly whether they are common (given by many people) or relatively uncommon.
31 Extensive literature has been produced on this process of creative thinking, and the measurement thereof (see Guilford, *ibid.*); J. E. Drevdahl, "Factors of Importance for Creativity", *Journal of Clinical Psychology*, XII (1956), pp. 21-26; A. Newel et al., "The Process of Creative Thinking, Contemporary Approaches to Creative Thinking H. E. Gruber et al (eds.), (New York: Harper Brothers, 1962), pp. 65-66; P. Smith, (ed.), *Creativity: An Examination of the Creative Process* (New York: Hastings House, 1959).
32 For development and validation of the *Creativity Instrument*, see Appendix.
33 The questionnaire was inadvertently omitted from the battery presented to the senior students at School C.
34 In interviews with head nurses and Ryerson graduates (see Chapter II) the young Ryerson graduate was noted for her ability to ask questions and her interest in change.
35 Katz, *Growth and Constraint*, pp. 1-122.

PART III

HOW DOES THE SYSTEM WORK?

TEACHING OF NURSING

CHAPTER 7

FACULTY — QUANTITATIVE ANALYSIS

What are the characteristics of faculty

who come to these schools to teach?

Why do they come? What is their preparation?

What type of nurse are they trying to prepare?

How do they teach nursing?

Views concerning the aims of the Ryerson program and the beliefs and practices of faculty were obtained through observation, interview, and the study of reports and records. According to the Director and faculty of the Nursing Program at Ryerson:[1]

> The course is directed toward certain general aims related to the nurse who has a broad education — humanities and a sound basis in the sciences including behavioral sciences; a thoughtful and analytical approach to the nursing of patients; and an independent, questioning, and confident outlook on nursing care and on health services in general.

The faculty strongly believe that the multidisciplinary setting of Ryerson contributes to the education of nurses; benefits of the setting to faculty were perceived as follows:[2]

> No precedent in nursing education at Ryerson, therefore no established curriculum to follow or set notion of how nursing should be taught; a centre of ideas, views, and experiences from many disciplines allowing for and fostering discussion, sharing, and critical analysis both on the part of students and of faculty; an institution primarily concerned with learning, therefore opportunity to treat students in nursing as learners and not as practitioners.

This information on the beliefs of faculty as stated above provided the context within which the researchers developed guides for the collection of data relevant to faculty and the teaching of nursing at Ryerson. These guides are contained within the following arguments.

1. *Given* that the faculty of Ryerson wish to work in a situation differing from the established structure for nursing education, therefore

> In selecting Ryerson as a place in which to teach, faculty seek an opportunity to participate in the building of a new type of program for the preparation of nurses.[3]

2. *Given* that the Ryerson program aims to provide students with a broad education including humanities and social sciences and to foster contact with faculty and students in other fields of study, it follows that Ryerson faculty would view nursing as part of society and nursing education as related to education in general, therefore

> The belief systems of faculty relating to nursing and nursing education could be characterized as "open" as opposed to "closed."[4]

3. *Given* that faculty of Ryerson wish to develop a new type of program to educate nurses, it would seem reasonable to suppose that they would also be trying to prepare a nurse, appropriate to the health services of the future, therefore

> Faculty hold future-oriented as opposed to more traditional views of nursing.[5]

4. *Given* that faculty are seeking to develop a new type of program and have the opportunity to treat the student as a learner and not as a nurse providing a service, therefore

> In problems of curriculum and teaching, the approach of the Ryerson faculty incorporates efforts to examine, explore, and define problems to a greater extent than activity directed toward finding immediate solutions.[6]

5. *Given* that faculty of Ryerson wish to teach a thoughtful and analytical approach to the nursing of patients and an independent and questioning outlook on nursing, therefore

   a. In teaching nursing, Ryerson faculty assist the student to look to the patient as a primary source of information about his needs and care as opposed to seeking such direction from the unit staff, and as a sequel

b. Students are assisted to develop their ideas and plans for patients in view of the therapeutic regime in lieu of expecting a ready-made plan of care from the unit.[7]

6. *Given* a broader education in humanities and in the sciences and considering the student as a learner and not as a practitioner, the Ryerson faculty would have a situation in which they can promote in the students a thoughtful and analytical approach to the nursing of patients, therefore

> In teaching nursing, the Ryerson Faculty emphasize *process*, the dynamic aspects of an approach to nursing or how one goes about nursing, in preference to *content*, that is a body of knowledge and skills of nursing to be applied.[8]

To gather evidence related to these arguments, data were collected from the faculty at Ryerson and for comparative purposes, from the faculties in Schools A, B and C through open-ended questions and by pencil and paper tests devised to measure particular attributes. This information was obtained under similar conditions from eleven faculty members at Ryerson, sixteen at School A, thirty-one at School B, and thirty at School C.

TABLE 30

EDUCATIONAL PREPARATION OF FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

	Ryerson N=11	*School A* N=16	*School B* N=31	*School C* N=30
Basic Nursing Preparation				
Diploma - hospital school	7	7	28	28
- independent school	-	6	-	-
Degree - university program	4	3	3	2
University Degree or Diploma				
Master	2	1	0	3
Bachelor	8	13	17	17
Diploma	-	1	8	9
None (basic preparation only)	1	1	6	1

About a third of the initiators of the nursing program at Ryerson are graduates of basic university programs, and one-fifth of the

faculty in School A have the same preparation: However, the number with a basic degree in Schools B and C is negligible. Although most faculty members at Ryerson and in School A hold a bachelor's degree, approximately one-third of the faculty members in Schools B and C have less than this minimum preparation for the teaching of nursing.

Age of Faculty	Ryerson	School A	School B	School C
Mean number of Years	31.6	33.2	32.2 (N=24)*	39.2
Experience in Teaching				
Mean number of Years	5.5	4.9	3.4	8.6

Discounting School B, the faculty of Ryerson is the youngest and that of School A has the least experience in teaching. The faculty in School C is considerably older and have had many more years' experience in teaching. What are the consequences of these facts on the teaching of nursing? Are the factors of age and experience related to the subsequent findings? This study does not provide answers to these questions, but rather poses them for the consideration of the reader.

CHOOSING A JOB IN TEACHING

> In selecting Ryerson as a place in which to teach, faculty seek an opportunity to participate in the building of a new type of program for the preparation of nurses.

A procedure was developed to obtain data on the desirable characteristics of a job teaching nursing. In deciding to teach at Ryerson, we wonder if faculty are attracted by the opportunity to build a program together in a situation which lacks a tradition and prior structures for the education of nurses and where teachers are able to develop their own area of concern and responsibility. On the other hand, we think that teachers in Schools A, B and C are drawn less by these features and more by the reputation of the school where the curriculum is evident and well-structured, responsibilities are clearly outlined, and the job is defined.

Method 1

A number of items were devised to reflect these two diverse positions:

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* Three persons, employed in School B for many years, failed to indicate their age or experience in teaching; for this reason the low means for age and experience probably are not valid for this school.

Position 1 — *Program New-Development Together*

The school is new and developing.
The school encourages trying new ideas.
Other faculty members have imaginative ideas about the curriculum.
Class size is appropriate for teaching methods and curricular needs.
Faculty members work together coordinating their teaching.
Hours of work may be adapted to the needs of the job.
Teaching aids (library, films, etc.) are available.

Position 2 — *Program Set-Job Defined*

Each teacher sets up her own part of the program.
The school has a well-established reputation.
Each teacher has clearly defined responsibilities.
Expectations for students are clearly defined.
The position and salary offered are commensurate with previous experience.
The overall curriculum is clearly outlined.
Each teacher may decide her own teaching methods.
Faculty members are experienced.
Teaching methods used have been tested and evaluated.

Teachers at Ryerson and in Schools A, B and C were asked to rate the importance of each item as a factor to be considered in the choice of a job in teaching nursing. The instructions directed respondents to sort the items according to a forced-choice allocation from least to most important. The items reflecting the two positions were presented in random fashion. A copy of the form may be found in the Appendix. In analysing the results, the importance of the individual items was ranked for each school and a total rank for both of the positions obtained by summing the individual items ranks. (Table 31).[9]

Findings

It is clearly shown in Table 31 that in choosing a place in which to teach nursing, Ryerson faculty rank items related to a new program, to working together to develop the courses, and to using new ideas and methods to a higher degree than do faculties in the other three schools of nursing. School B and School C, long associated with hospitals, are in the process of major curriculum change as indicated by their moderate adherence to both the characteristics of the new situation and, at the same time, the characteristics of the more set situation. School A, an autonomous school, has had time to establish

some traditions, a reputation, and a well-structured curriculum as demonstrated by the high rank accorded the items of the Program Set-Job Defined position in this questionnaire. These findings may, in fact, reflect the actual location of each of the schools on a continuum of change and development in their individual program.

TABLE 31

RECIPROCAL COMBINED RANK ORDERS OF TWO SETS OF CHARACTERISTICS DEEMED DESIRABLE IN A JOB TEACHING NURSING BY FACULTY AT RYERSON AND AT SCHOOLS A, B AND C, 1968-69

Positions	*Ryerson* N=11	*School A* N=16	*School B* N=31	*School C* N=30
Program New — Development Together (7 items)	79.0	69.0	74.5	75.5
Program Set-Job Defined (9 items)	57.0	67.0	61.5	60.5

Method 2

In an open-ended question faculty in all schools were asked:

What were your reasons for choosing to teach here?

In analyzing the content of the responses, four types of reasons for choosing to teach in the particular school emerged. Each reason is described below, followed by examples taken from the response of faculty in all schools.

1. *A New Program and a Challenge to the Teacher* — A new and challenging program, offers scope, freedom to try out ideas and methods, to plan and to develop the curriculum.

Examples

"Interest in the development of a psychiatric nursing course within a new two-year program."

"My first position here was teaching in the intensive care unit. I was given the opportunity to work general duty first and then set up a program. I considered it a challenge."

"Simply that it was a new and experimental kind of program — in on the ground floor, planning, etc."

2. *The Type of Program* — It is the type of program which I believe in, i.e. within the general system of education, a two-year, or a two-plus-one program.

Examples

"New approach to preparation of nurses, i.e. within general educational system, attracted me."
"Respected two-year non-hospital program with their emphasis on student learning."

3. *The Reputation of School and Program* — The reputation and philosophy of the program and the staff, a place in which I can readily fit, a place where I shall receive support and guidance.

Examples

"Agreed with and understood philosophy of curriculum. Knew that the School encouraged individual's ideas, and supported reasonable innovations."
"The graduates of this program seemed to be well spoken of by both medical staff and by non-medical personnel."
"After an interview with the director and reading literature about the school, I felt the philosophy of nursing here and my own philosophy of teaching and nursing were either the same or very much in agreement. Also came here because this is an autonomous school of nursing where the aim is *education* rather than *service*."
"As this is my first year of teaching, I chose this school because I felt the experience to be gained in a school with tradition and an excellent reputation outweighed the challenge of a newer school. I felt that from the more structured situation I hoped to find here, much would be gained and I could benefit from the long-term experience of other personnel."

4. *Personal Convenience* — A position was offered to me, we (husband, family) live here, I am committed because of sponsorship for bursary, it is my own school and I am familiar with the place, the salary, and other conditions.

Examples

"I went to university for a combined course in education and administration — sponsored for a bursary by this hospital — on return I was told where I would be placed."
"I enjoyed my training here. The school was familiar and I

could devote more energy to teaching and learning rather than finding my way round. It's hard enough starting anything new."

"None in particular except that it was available when I wanted to start work. A friend of mine also recommended this School of Nursing."

Findings

Table 32 shows that the reasons stated by Ryerson faculty for choosing to work there are evenly dispersed among the four categories of response; whereas the distribution is bimodal in the other three schools. The "Reputation of the School and Program" receives primary emphasis in School A and "Personal Reasons and Convenience" provides the peaks in Schools B and C.

Discussion

How can we assess these results? We can say that persons come to Ryerson for a variety of reasons, one of which is that it is a new program and a challenge to the teacher. It would appear that individuals seek employment in School A because the program itself has a reputation which is valued across the country. Does such a program

TABLE 32

REASONS OF FACULTY FOR CHOOSING TO TEACH AT RYERSON AND AT SCHOOLS A, B AND C, 1968-69

Category of Reasons	*Ryerson* N=11	*School A* N=16	*School B* N=26	*School C* N=29
New and Challenge to the Teacher	5	4	2	2
Reputation of Program	4	11	13	11
Type of Program	5	4	1	0
Convenience	5	8	19	24
TOTAL	19	27	35	37

attract those who are looking for the "good" and who wish to learn in a situation where the program is already established and the curriculum tested out? When we are still searching for the "good" in nursing and nursing education, how is this program influenced by faculty who are not themselves full of seeking, but who actually wish to fit

into what is widely reputed as "good"? What is the meaning of the finding that at least two-thirds of the responses in Schools B and C fall within the heading of "Personal Reasons and Convenience"? How does this affect the desire of these schools to promote development and change in their curriculum?

Conclusion

In asking faculty members to rank factors one looks for in a job teaching nursing and to describe reasons for choosing their present position, we may conclude that Ryerson faculty seek an opportunity to participate together in the building of a new type of program and in what that entails to a much greater extent than do faculty in Schools A, B and C. These faculties appear to seek either a program with an established reputation, curriculum outlined, and job responsibilities defined *or*, on the other hand, to select their job on the basis of personal convenience. In spite of the evidence in Method 1 to the effect that a position in a school developing a new program is attractive to some faculty members in Schools B and C, the overriding difference between each of these schools and Ryerson lies in the large proportion of teachers for whom this was an apparent unanticipated consequence of having selected the job for its personal convenience aspects.

BELIEFS ABOUT NURSING AND NURSING EDUCATION

Faculty beliefs relating to nursing and nursing education may be viewed as "open" systems as opposed to "closed" systems.

In his book, *The Open and Closed Mind,* Rokeach investigates the nature of belief systems. He is concerned with the organization and structure of the belief system: How one believes or how beliefs are held as opposed to the content of beliefs.[10] Openness in a belief system is characterized by being able to receive, evaluate and act on relevant information received from outside on its own intrinsic merits unencumbered by irrelevant factors arising from within the person or from outside. A belief system may be described as closed when new information cannot be considered and where beliefs are set or held in dogmatic fashion.[11] Rokeach developed a tool to test the extent to which belief systems are open or closed.[12]

If we believe that an educational institution providing a wide spectrum of offerings from the humanities and social sciences, on the one hand, to a variety of technologies on the other, fosters in students and in teachers a desire for discussion, listening to the ideas and sug-

gestions of others, exploring questions, and a willingness to rethink one's position or views on a subject; then we would expect Ryerson faculty to demonstrate a higher degree of openness in belief systems as described by Rokeach than faculty in Schools A, B and C.

Method

A new instrument, similar to Rokeach's, was devised to measure beliefs about nursing and nursing education. Extensive reliability and validity checks were carried out to ensure that each item measured the same factor as did the Rokeach test.[13] Respondents were asked to indicate the extent to which they agreed or disagreed with each of the forty-five items of the test. While the complete instrument as presented may be found in the Appendix, a few sample items follow:

> Of all the different approaches to preparing nurses, there is probably one way which is best.
> A nursing instructor who gets enthusiastic about too many trends in nursing education is probably ineffectual in working toward any.
> Unfortunately, a good many instructors with whom I have discussed some of the crucial problems in the teaching of nursing really don't understand what it is all about.
> It is only natural that a nurse would have a better understanding of the views of nursing she believes in, than in those she opposes.
> Student nurses shouldn't have too easy access to different approaches in nursing — it would only confuse them.
> The situation of nursing today is so complicated, that the only way we can know what is going on is to rely on nursing leaders.
> I really get annoyed whenever a nurse or a doctor refuses to admit that he or she is wrong.

The items are scored so that the greater the minus quantity, the higher the rating in qualities characteristic of "openness" in belief systems with respect to nursing and nursing education.

Findings

Table 33 indicates that the faculty of Ryerson score highest on "openness". However, a one-way analysis of variance signifies that there is as much difference within each faculty as there is among faculties. Inspection of the scores of the Ryerson faculty shows clearly the polar position of some members. A glance at the range of scores helps to verify the variance within each faculty.

TABLE 33

OPENNESS OF BELIEF SYSTEMS IN NURSING AND NURSING EDUCATION OF FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty	Mean Score	Rank
Ryerson (N=11)	-66	1
School A (N=16)	-52	4
School B (N=31)	-53	3
School C (N=30)	-58	2

OPENNESS OF BELIEF SYSTEMS

Ranges of Scores

Ryerson	84 points
School A	67 points
School B	119 points
School C	83 points
Mean Range	88 points

Further study of the data demonstrates differences in the proportion of individual scores falling above and below the mean score for all faculty members. In both Schools B and C, approximately half the cases fall above and below the mean. However, a much greater proportion of cases falls above the mean at Ryerson and below the mean in School A. (Table 34).

TABLE 34

PROPORTION OF SCORES ON OPENNESS LOCATED ABOVE AND BELOW THE MEAN SCORE FOR ALL FACULTY MEMBERS AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Position	Ryerson	School A	School B	School C
Below Mean	.273	.687	.416	.5
Above Mean	.727	.313	.484	.5

Although the statistical analysis does not support our original argument the evidence shows that openness of belief systems is characteristic of a greater proportion of faculty members at Ryerson than of

faculty in the other three schools. This finding suggests that the belief systems of more of the Ryerson faculty are open to new information and that on this basis they are more able to receive, evaluate and use information with respect to nursing and nursing education than are faculty in the other three schools. In other words, the beliefs of a greater proportion of Ryerson faculty are held in less dogmatic fashion.

NURSING VALUES

Faculty hold future oriented as opposed to more traditional views of nursing.

Method

The literature describing "today's" nurses, nursing, and preparation of nurses was compared and contrasted with that describing an "earlier" period. Qualities and characteristics of both were utilized to construct a questionnaire to provide a "values picture" of the individual nurse based on her choice of action in a variety of nursing situations. This picture or set of values consists of eleven pairs of value dimensions, represented by eighteen items, one value of each pair describing the "traditional" nurse and the other value, the "modern" nurse. Each item was scored on a scale of one to four resulting in a total score of from eighteen to seventy-two, the higher the score the more modern the values.[14] The assessment of values is one of the major undertakings of this study; comparisons have been made of the nursing values of faculty, students, nursing service personnel in cooperating agencies and of Ryerson graduates and the nurses with whom they work in the employment situation.

Findings

Table 35 shows the mean scrore for each faculty on the Nursing Values Test. A one-way analysis of variance, Table 36, was done to determine if the scores of faculty in the four programs differ significantly from each other.

On the basis of forty-five as the median score on the traditional-modern values scale, Table 35 shows that the mean scores for all faculties fall within the modern values sector. School A leads in espousing modern values followed by School C and Ryerson; of the four faculties, School B shows the least commitment to modern values. Although the apparent differences in the mean scores are small, a range of 7.6 points, the analysis of variance indicates that the scores of the faculties are significantly different from each other, $p \ll .05$.

TABLE 35

MEAN SCORES FOR NURSING VALUES OF FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty		Score
Ryerson	N=11	57.1
School A	N=16	61.4
School B	N=29	53.8
School C	N=30	58.0

TABLE 36

ANALYSIS OF VARIANCE OF THE NURSING VALUES SCORES OF FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Source of variation	Sum of Squares	df	Variance Estimates	F
Between	629.00	3	209.67	4.03*
Within	4261.88	82	51.97	
Total	4890.88	85		

*F.95 (3,82) = 2.76

Discussion

For a number of years prior to the Ryerson nursing program, School A had been perceived as the exemplar of the "modern" in diploma nursing education in Canada. It is not surprising, therefore, to find the faculty of School A embracing modern values in nursing to a greater extent than the faculties of the three other programs. Although it was expected that Ryerson faculty would hold more modern values than other faculties, this hypothesis was not upheld. How can one account for this finding?

The Ryerson faculty have consistently taken the stand throughout the study that they are employed to teach and that their strength lies in education, in learning and teaching, and that the content of teaching, i.e. nursing, is incidental. Furthermore, they believe this viewpoint prevails among Ryerson faculty in other fields. If so, the com-

mitment to teaching and learning in this type of educational institution is worth marking, for it differs from the university where commitment to one's discipline tends to predominate. One of the Ryerson faculty explained their position: "In reality we are not the researchers and innovators in nursing; our job is to study, to explore and to find more effective ways of teaching nursing."

Ryerson faculty have also specified that they are not preparing a new type of nurse, but one who will fit readily into the work world, yet participate actively in change directed toward improved nursing. Possibly these explanations help us to understand the position of the Ryerson faculty on the Nursing Values Test.

As the nursing values of the Ryerson faculty fall within the value range of the other faculties and as they are not seeking to prepare some "ideal-type" nurse of the future, we might then logically infer that they have a relatively well-defined picture in mind of the performance they expect of their graduates and therefore, that they should feel comparatively confident in their ability as teachers to achieve it.

ATTACKING CURRICULUM PROBLEMS

> In problems of teaching, the approach of the Ryerson faculty incorporates efforts to examine, explore and define problems to a greater extent than activities directed toward finding immediate solutions.

Nurse educators have long argued that we must restudy the typical learning situations which are generally considered basic or fundamental to the nursing curriculum, if we are to change nursing education and prepare nurses within a relatively short period of time to function effectively in the health services of the future. It would seem reasonable to suppose that faculty, who do not take problem situations in nursing education "as given" in the sense of their usual definition and who do not have ready solutions at hand for each problem posed, would in fact be the type of teachers who are able to take a fresh look at a nursing program unencumbered by specific requirements or policies regarding experience and content in the nursing curriculum. In this respect, we might consider that such a faculty have a potential for creativity.

Method

Brief descriptions of faculty discussion surrounding educational problems were developed to simulate typical controversial topics discussed in faculty meetings. Teachers in the four schools of nursing

were asked to indicate in each situation what their response would likely be as the next participant in the discussion. An example follows:

> Assume that you are at a Faculty Meeting at which the following statements are made by three other teachers. Write in the space below what you would say in relation to this.
>
> a. Operating room experience is a waste of student time — the things they learn there can be learned just as well elsewhere.
>
> b. I don't think it's a good idea to stop it until we really study it — it's always been in the curriculum and I suspect some valuable learning takes place there.
>
> c. Isn't there a provincial regulation requiring it?
>
> You — .....
>
> .....

The form, including directions to respondents and problem situations as presented, may be found in the Appendix.

Findings

Analysis of the data generated two types of response to problem situations, one of which has two sub-divisions. Respondents either wish to investigate the situation further or they propose a solution to the problem. If they propose a solution, it tends to favor either a traditional or a novel approach. The classification of responses may be portrayed as follows:

1. Investigation — asks further questions, gathers more data, investigates the problem.
2. Decision — makes a decision, provides a solution
   (a) Traditional — decides on what has proved best in the past, accepts a traditional view.
   (b) Novel — decides on change from the past, accepts a novel view.

Do we believe there is merit in exploring a problem, in seeking to identify the context within which the situation occurs and, in general, asking the question: What really is the problem here? Or do we think that most problems are already known and satisfactory solu-

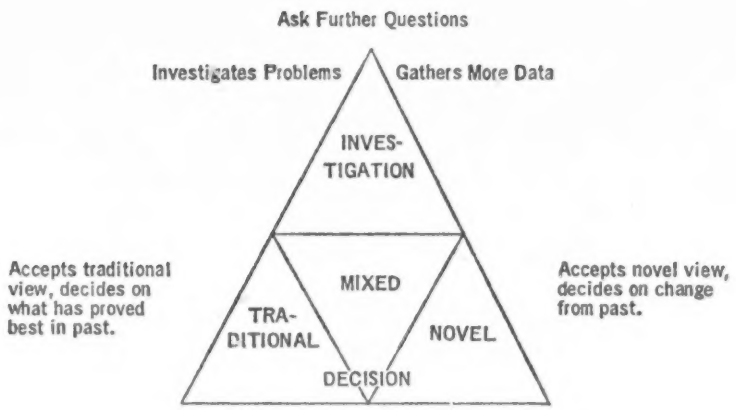


Diagram 3 – Categories of Response to Problem Situations

tions discovered? Does the former position permit a faculty to perceive situations differently, to introduce new ideas and points of view, and does this lead to rethinking questions and practices?

Table 37 indicates that Ryerson teachers use twice as many investigative approaches to problem situations as proposals for solution. Whereas in the other three schools, arriving at an immediate decision predominates as the method of choice, increasingly so in the

TABLE 37

TYPES OF RESPONSE OF FACULTY TO PROBLEM SITUATIONS IN NURSING EDUCATION AT RYERSON AND SCHOOLS A, B AND C, 1968-69

Type of Response	Number of Responses			
	Ryerson N=10	*School A* N=14	*School B* N=31	*School C* N=30
Investigation	6	6	11	12
Novel Decision	2	2	5	3
Traditional Decision	1	5	13	15
Mixed Response	1	1	2	0

two larger schools. It is interesting to note the preponderance of traditional-type solutions to problems in these schools as compared with novel solutions.

Conclusion

This analysis appears to support the notion that Ryerson teachers use more investigative devices in their approach to problems than do faculties in the other schools. What are the logical consequences of these findings? Given the validity of this analysis, we might expect the Ryerson faculty to perceive curriculum issues within broader contexts, to address new questions to old problems, to introduce a variety of ideas and view-points and to rethink questions of curriculum structure and teaching methods.

LEARNING TO TAKE RESPONSIBILITY

> In teaching nursing, Ryerson faculty assist the student to look to the patient as a primary source of information about his needs and care as opposed to seeking such direction from the unit staff; and as a sequel
> Students are helped to concern themselves with the development of *their* ideas and plans for patients in view of the therapeutic regime in lieu of expecting a ready-made plan of care from the unit.

Fundamental to learning "to take responsibility" (voiced by some as the heart of nursing), is the ability in the student to carry out those nursing behaviors associated with the areas in which responsibility is to be taken. We must assume that the underlying moral behavior, — to be a responsible person, to fulfil one's duty, to do what one *should*, is an objective of educational forces earlier in the student's background. We may think of the entering behavior of the student into the school of nursing as representing an inchoate form of responsible behavior with respect to the practice of nursing. Certainly those who admit students to schools of nursing search their applications for examples both of responsible and irresponsible behavior in high school and family life. The school of nursing must presume such a state of responsibility in the student, encourage it, and endeavor to provide the student with the "know-how" so that she is capable of and prepared to assume the responsibility nursing believes she should take.

We may think of two major avenues of emphasis in teaching students to take responsibility. One may be referred to as the "accountable to" phenomenon and the other, the "accountable for". In the "accountable to" situation the student learns a packet of tried and true approaches, methods, and procedures with the accompanying knowledge and principles, so that she can perform in a known and predictable fashion in the majority of nursing situations with which

she is faced. She knows the scope of her capability and understands the limitations of her function. When problems arise, there are persons to whom she can turn for direction and who can authorize whatever she should do and, at the same time, take responsibility for her action. Here the nurse is "accountable to" a prior body of knowledge or skill or to another person, i.e. the head nurse, the supervisor, the doctor — responsibility to some authority.

On teaching for the "accountable for" type of responsibility, concerted effort is made to assist the student to be able to find out more herself and to consult with and consider the suggestions of others, but to reach her own conclusion and to assume responsibility for the consequences of her actions. Ultimately as the student learns how to be responsible in a representative number of nursing situations, she will as a graduate shoulder responsibility for her own decisions and actions within the area of her practice in nursing — responsibility through problem solving.

Given the educational setting of the Ryerson program and the aim of faculty to develop in the students an analytical questioning approach to nursing, we might expect them to emphasize "accountable for" behaviors in teaching students to take responsibility.

The instrument to assess responsibility is composed of a series of items, behavioral examples, grouped into a matrix based on the two categories (1) "accountable to" and (2) "accountable for" and their sub-categories,

a) focus on self nursing a patient

b) focus on the team, unit or institution

The matrix is as follows:

MATRIX OF DIMENSIONS OF
RESPONSIBILITY SCALE
(with sample item)

FOCUS	"ACCOUNTABLE FOR" (Rational — problem solving)	"ACCOUNTABLE TO" (Direction or authority)
On Self Nursing a Patient	A. Item: Observes and gathers relevant information on which she bases her assessment of patient needs.	B. Item: Is efficient and skilled in the performance of nursing procedures and techniques
On Team, Unit or Institution	C. Item: Provides helpful ideas and suggestions about the care of patients on the ward.	D. Item: Pays attention to the policies and procedures of the institution.

In the development of items, a series of procedures was carried out to establish the validity and reliability of groups of items by category, by sub-division, and by individual item in each sub-division. Of a large number of items, twenty-two remained, having survived all the testing. See the Appendix for validity and reliability procedures for the Responsibility Instrument.

Teachers were asked to rate the twenty-two items of the test on a forced-choice five-point scale to indicate the desirability of each item in nursing performance and, for this reason its importance in the teaching of nursing. A copy of the final test, including directions, may be found in the Appendix. Each item was accorded a score of from one to five depending on its placement by the respondent on the desirability scale (5-high desirability). A total score was obtained by adding the individual item scores across all respondents in the faculty and a composite score established by summing the total scores of items in each category. A mean score per category was determined as follows:

$$\text{Mean Category Score} = \frac{\text{Composite Score for Category}}{\text{No. of Respondents x No. of Items in Category}}$$

Three questionnaires from School B and two from School C were deleted because the instructions had not been followed.

In addition to the questions of this section, the following proposals were suggested. It is an established finding in the study of organizations, such as hospitals, that they are concerned more with overall predictable performance, i.e. an acceptable standard of nursing for all patients, than with nursing performance directed toward the individual patient. For this reason, it seems reasonable to suppose that:

Proposal 1

> In striving for greater predictability in nursing performance, teachers in schools of nursing associated with or organized within hospitals, School B and School C, will select for emphasis in teaching more "Accountable to" behaviors than will teachers in schools located outside hospitals, Ryerson and School A.

Proposal 2

> Conversely, teachers at Ryerson and School A will select for emphasis in teaching more "Accountable for" behaviors than will teachers in School B or School C.

Proposal 3

> In schools of nursing associated with or organized within hospitals, School B and School C, teachers will orient their teaching to the needs of the team, unit or institution to a greater extent than will teachers in schools located outside hospitals, Ryerson and School A.

Although teachers in schools of nursing generally and the nursing profession as a whole extol the virtue of nursing the individual patient, it seems reasonable to suppose that schools organized outside hospitals will have greater opportunity to achieve this emphasis in teaching. This notion is further supported by the fact that teachers and students who use clinical fields in a variety of hospitals are probably less able to operate at the team or unit level because they do not remain in one situation long enough to assume a meaningful position vis-à-vis the ward as a whole with its staff and patients. On this basis, we hypothesize:

Proposal 4

> That teachers at Ryerson and School A will orient their teaching to the care of individual patients to a greater extent than will teachers in School B and School C.

In summary, the proposals to be tested are:

> In School B and School C "accountable to" behaviors will be greater than in School A and Ryerson.
> In Ryerson and School A "accountable for" behaviors will be greater than in School B and School C.
> In School B and School C, team or unit nursing behaviors will be greater than in Ryerson and School A.
> In Ryerson and School A individual patient nursing behaviors will be greater than in Schools B and C.

Findings

Table 38 gives the Mean Category Scores for responsibility behavior in nursing promoted by faculty in the four nursing programs. School A places the most emphasis on "accountable for" behaviors in nursing (responsibility through problem-solving) directed toward the individual patient and School B the most emphasis on "accountable for" behaviors directed toward the team, unit or institution. School B achieves the highest score in "accountable to" behaviors, i.e. responsibility to authority with individual patients and School C, the highest with the team, unit or institution.

TABLE 38

MEAN CATEGORY SCORES FOR RESPONSIBILITY BEHAVIOR IN NURSING EMPHASIZED BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Categories of Responsible Behavior and the Nursing Context	Ryerson N=11	School A N=16	School B N=28	School C N=28
"Accountable for" Behaviors directed toward				
Nursing the Individual Patient	4.30	4.46	4.15	4.22
Team, Unit or Institution Nursing Behaviors	3.24	3.14	3.31	3.03
"Accountable to" Behaviors directed toward				
Nursing the Individual Patient	3.20	2.92	3.24	3.06
Team, Unit or Institution Nursing Behaviors	2.45	2.66	2.57	2.88

Our expectation that the Ryerson program would achieve the highest score in "Accountable for" Behaviors either for the individual patient or for the group is not upheld. However, their ranking of second highest suggests such a direction in the teaching of nursing. Certainly none of the scores deviates to any great extent across schools, leading us to conclude that graduates of the Ryerson program probably learn as students to take responsibility in nursing in much the same way as do graduates from the other schools.

In Table 39 the composite scores for Table 38 are recombined to provide combined scores on "Accountable for" Behavior, "Accountable to" Behavior, "Nursing Behaviors Directed Toward the Individual Patient" and "Nursing Behaviors at the level of the Team, Unit or Institution."

It may be noted that the "Accountable for" Behaviors or responsibility through problem-solving play a larger part in the teaching of nursing in Ryerson and School A than in Schools B and C, thus lending support to the second proposal. Furthermore, "Accountable to" Behavior or responsibility to authority is noticeably higher in

TABLE 39

COMBINED CATEGORIES OF RESPONSIBILITY BEHAVIOR IN NURSING EMPHASIZED BY FACULTY AT RYERSON AND SCHOOLS A, B, AND C, 1968-69

Combined Categories of Responsibility Behavior	Ryerson	School A	School B	School C
"Accountable for" Behavior directed toward Individual and Team, Unit or Institution	7.54	7.60	7.46	7.25
"Accountable to" Behavior directed toward Individual and Team, Unit or Institution	5.65	5.58	5.81	5.94
"Accountable to" and "for" Behavior directed toward Individual Patient	7.50	7.38	7.39	7.28
"Accountable to" and "for" Behavior directed toward Team, Unit or Institution	5.69	5.80	5.88	5.91

Schools B and C than in Ryerson and School A, supporting the first proposal. Responsibility behavior directed toward nursing the individual patient is substantially higher in Ryerson, however the prediction is not upheld in School A. Schools A and B show approximately equal concern with nursing the individual patient. Thus the fourth proposal is only partially upheld; however, it should be recalled that School A ranked highest in responsibility through problem-solving in relation to the individual patient. Responsibility behavior directed toward team, unit or institution nursing behaviors is greater in both Schools B and C as predicted in the third proposal.

The findings related to the third proposal lend support to the idea that schools located outside hospitals may have difficulty including preparation at the team, unit or institution level as suggested previously. Both Ryerson and School B speak frequently of preparing team leaders, however, School B leads the schools in this goal. On the other hand, Ryerson appears to be achieving reasonably well in emphasizing "Accountable for" behaviors at the team, unit or institution level. It is quite clear in considering the four nursing programs that

nursing at the team or unit level receives less emphasis than nursing directed toward the individual patient.

To conclude our study of teaching students to take responsibility, it may be noted that both Ryerson and School A, nursing programs organized outside hospital, are more able in working with students to assist them to develop their own ideas and plans in response to the needs of individual patients and to take responsibility for the consequences of their nursing care. These findings lead us to accept the original arguments proposed at the beginning of this section as valid for School A and Ryerson; that is:

(a) the student looks to the patient as a primary source of information about his needs and care

(b) the student concerns herself with the development of *her* ideas and plan of care for the patient.

Footnotes

1. Communication from Faculty of the Nursing Program at Ryerson Polytechnical Institute, 1967-68.
2. *Ibid.*
3. For the study of this question, see p. 142.
4. *Ibid.*, 147.
5. *Ibid.*, p. 150.
6. *Ibid.*, p. 152
7. *Ibid.*, p. 155.
8. *Ibid.*, p. 162.
9. Combined faculty ranks by school and by item for each position are displayed in the Appendix.
10. Milton Rokeach, *The Open and Closed Mind — Investigations into the Nature of Belief Systems and Personality Systems.* (New York: Basic Books, Inc., 1960).
11. *Ibid.*, p. 57.
12. *Ibid.*, pp. 72-80.
13. A description of the development of the instrument for the Ryerson study with the reliability and validity data may be found in the Appendix.
14. A detailed description of the value dimensions and the validity testing may be found in the section on The Student, p. 92, and in the Appendix.

PART III

HOW DOES THE SYSTEM WORK?
TEACHING OF NURSING

CHAPTER 8

FACULTY — QUALITATIVE ANALYSIS

CRITICAL ASPECTS OF NURSING TO BE LEARNED

> In teaching nursing, the Ryerson faculty emphasize *process*, the dynamic aspects of an approach to nursing or how one goes about nursing in preference to *content*, that is a body of knowledge and skills of nursing to be applied in individual patient situations.

To obtain further information on the kind of nursing that faculty are endeavoring to teach, each member was asked a number of questions. This section includes an analysis of faculties' responses to these questions.

Question 1

> What five (5) behaviors or aspects of performance in nursing do you believe to be critical for the student to learn if she is to become a nurse through this program?

A content analysis was carried out on the statements made by faculty at Ryerson and in Schools A, B and C. The responses to Question 1 were analysed both for type of content and for mode of expression. An outline of the classification follows:

Classification of Statements Describing
Critical Aspects of Nursing Performance

Type of Content

1. Nursing
   a) Content — knowledge and skills to be applied (Nursing Known a *Priori)*
   b) Process — approach to nursing (Situation-Responsive nursing)
2. Personality and Professional Attitudes

Mode of Expression

1. Broad Behavioral
2. Specific Behavioral
3. Global

As may be seen from this classification, the content of statements fell into two groups: statements relating to nursing and statements relating to the personality or the professional attitude of the nurse. In addition, the mode of expression of statements was categorized as broad behavioral, specific behavioral and global.

An analysis of the content statements on nursing made by the faculty at Ryerson and in Schools A, B and C generated two broad views or patterns of nursing. These two positions are described in the following paragraphs.

Position Statements on Nursing

Nursing as Content

Statements from this group indicate that the nurse has *knowledge* of or *knows* the needs of people in sickness and in health and that her primary concern is to be able to *apply* this knowledge in making decisions about what her patients require. For example, respondents state that the nurse will know Maslow's hierarchy of needs and that she will then be able to assess her patient's need for care on the basis of this knowledge. In addition, she will be able to bring a variety of other kinds of knowledge to bear in carrying through the nursing care of this person.

In the *plan* of care to meet the patient's needs and in making decisions about the organization of work, primary emphasis is placed on pre-established criteria relating either to some priority of needs as given or to the priorities of the institution.

Statements describing actual *performance* emphasize that the nurse have expert skills technically, interpersonally in communication, and in routine procedures, and that she be able to give good quality nursing.

Statements relating to *evaluation* are prominent: Specifically the nurse should know her own limitations and she should at all times focus on the provision of safe nursing care for her patients.

Within the framework of *continuing* to *learn* and to develop, emphasis is placed on accepting criticism from others, i.e. supervisors and clinical instructors, and being willing to keep up with new knowledge.

> Here the nurse *observes* the patient and picks up cues or behavioral manifestations to think about and to consider in *assessing*, planning and in making decisions about care. Emphasis is placed on gathering information from a variety of sources, particularly the patient, to use in arriving at some indication of the patient's needs.
>
> Priorities of care arise out of this assessment and form the basis for the *plan* of care.
>
> *Nursing action* tends to be viewed as an entity, a whole kind of performance directed toward some specific goal for the patient, i.e. comfort, rest, exercise, or something of this nature.
>
> The *evaluation* phase of nursing concentrates on the immediate situation in viewing the consequences to the patient of nursing action in relation to the goal. Action which has favorable outcomes with respect to the goals for the patient, or action which does not appear to have the anticipated outcomes, or which has unfavorable outcomes provide information for feedback in evaluating and in planning further care for the patient.
>
> With respect to continuing to *learn* in the future, the previous method of evaluating nursing care is seen as the basis for further development of the nurse; for in this way she learns through finding more effective nursing patterns. Emphasis is placed on the nurse seeking out required information and using resources as they are needed to make her own nursing care more effective, that is, that the consequences for the patient are more satisfactory.

The basic premise of the first position is that "good nursing" is known *a priori*. If this be so, then the constituents of "good nursing" as described previously provide the critical components of nursing performance for the students to learn and ***nursing as content*** becomes the focus of the curriculum. Here the student learns that the needs of the patients are known, knowledge can be applied, and great skill developed in the various types of nursing practice. As long as the nurse understands the scope of her function and requests assistance if a problem lies outside it, she will learn to give safe nursing care. The alternate view as described in the second position rests on the premise that the value of a nursing action depends on its effectiveness in achieving something for the patient. The consequences of nursing action act as feedback to the nurse so that she is being continually forced to observe, to gather more information, and to rethink her assessment and plan of care. Here we are describing a nurse

responding to a situation of which she is part, therefore the term *situation-responsive nursing.* In this case, the individual acts included in responding to the patient situation provide the critical components of nursing performance for the student to learn and *nursing as process* becomes the focus of the curriculum.

Examples Describing the Two Positions

Responses of Faculty at Ryerson and in Schools A, B, and C

Nursing Known a Priori — Nursing as Content

"Be able to apply principles."
"Depth in nursing care by anticipation of what to see and do for the patient, e.g. greeet the patient's family before they have to come looking for you."
"Demonstration of knowledge of common disease conditions."
"To have an adequate background of knowledge (in science, in nursing) so as to give comprehensive care."
"A mastery of the subject material presented (60% — a passing mark)".
"Have knowledge of how breakdown in normal body functioning affects a person's psyche and what reactions to expect."
"How to organize her time to get everything done."
"To become proficient in technical skills to the point that she performs them with little stress."
"To carry out the procedures and techniques that are needed in nursing in a safe, efficient manner."
"To use herself as a therapeutic tool — e.g. control the expression of her feelings in nursing situations."
"To realize her own limitations. (This is a must.)"
"Awareness of her own limitations and determination not to exceed them, yet to extend her knowledge and experience."
"To be able to accept and benefit from the process of constructive criticism."

Situation-Responsive Nursing — Nursing as Process

"Nursing care given on the basis of needs of the patient using problem-solving approach."
"To learn to assess a situation."
"A sensitivity to people — able to pick up messages sent out by persons as well as individuals in groups."
"Ability to assess and identify the problems the individual patient has in meeting his basic needs."
"Formulate and carry out a plan of care based on observations, information available and her own knowledge."
"Ability to understand the patient as he is influenced by his

family, community, culture and work with him effectively within this context."

"Ability to problem solve using knowledge gained to determine priority of nursing needs and nursing measures indicated."

"Assessment — ability to observe, analyze, and judge patient and related situations."

"Assessing effect of plan on patient and family and revising as needed."

"Evaluation of nursing care essential before future care given."

"Ability to reassess — to see if objectives have been met and if not, to identify the error in this process described."

"Alters nursing care — according to new knowledge, new resources, and her patient's response."

The second Type of Content emerging from faculty's responses describing the critical components of nursing performance has been identified as specific Personal Characteristics and Attitudes which the nurse should have and Professional Obligations which should guide her practice. Statements were classified as professional attitude or obligation if they related to nurses or nursing and as personality characteristic if stated in general terms.

Examples Describing Personality Characteristics and Professional Attitudes
Responses from Faculty at Ryerson and in Schools A, B and C

Personality Characteristics

"Flexibility."

"Integrity and willingness to see others' viewpoint."

"Sensitivity and judgment."

"Humility."

"Personal growth — learns to know self so that she can understand others."

"To have warmth which will help her to respond to people and people to her."

"Empathy."

"Self-awareness."

"Individuals are all different — belief in this."

Professional Attitudes and Obligations

"To realize that everyone has needs not just sick people."

"Neatness — in rooms, in charting, in manner of dress."

"Emphasis of completeness of activity — charting fully to avoid any lawsuits, to be informative, to relieve oneself of cer-

tain responsibilities."
"Willingness to help her fellow man — able to become a good team member."
"To develop a positive attitude about nursing."
"Belief in the individuality of man."
"She must maintain the individuality of her patients."
"To enjoy nursing and find happiness while pursuing it as a career — knowledge of self."
"Discretion in relation to discussion outside of school and hospital — in relation to hospital activities."
"Self-control — though this does not eliminate the expression of sympathy with patient's family, e.g. death."
"To dress appropriately on ward with adequate personal hygiene."
"To demonstrate commitment to the patient at all times."
"To be flexible and creative in all levels of performance."

In addition to the analysis of critical components of nursing performance by content, statements were classified according to their mode of expression as follows:
Broad Behavioral — Some statements were indicative of nursing performance in a broad sense in that they related two or more variables concerned with nursing.

"Learn to approach each individual patient as a person with his own special needs."
"Skill in performing nursing care and in meeting basic human needs of patients at a level of a beginning practitioner."
"Planning nursing care to meet problems after she has gathered information from her own observations, knowledge and resources."
"Ability to plan and coordinate — both for her own patients and for the team (functioning as a team leader)."
"Problem solving, i.e. planning, organizing and carrying out nursing care on the basis of the patient's needs and assets, and facilities and available time."
"Basic nursing skills and the ability to adapt them and add to them as required by the patient's time and circumstances."
"Evaluation — able to perceive objectively the outcomes of her care."

Specific Behavioral — Here individual procedures, specific types of nursing action, a defined area of knowledge, or some other small bit of nursing were cited as the critical behavior.

"Carrying out principles of rehabilitation."
"Good basic knowledge of aseptic principles."
"Skill in performance of nursing skills — beds, baths, dressings, medications, IV therapy particularly."
"Knowledge of common medical conditions and the appropriate nursing care."
"Organization — learn to collect all necessary data or equipment in order to perform the procedure at once."
"To communicate with her clinical teacher."

Global — Statements were described as global if they were applicable anywhere and to anyone in any profession or walk of life; statements unrelated to nursing.

"Independent study — by fostering research."
"Self-evaluation."
"Communication skills."
"Practise therapeutic interpersonal relations."
"Need to continue learning."

Procedure Followed in the Analysis of Responses

The two researchers of the study plus a nurse educator and a nursing service administrator discussed the system for classifying faculty responses on the critical components of nursing. Particular attention was paid to the comprehensive nature of the two positions on nursing and of their value in describing differences in the teaching of nursing and presumably, in the graduates of programs.

Findings

It is readily apparent from a study of Table 40 that faculty in all nursing programs emphasize the component of the Nursing Known *a Priori* position in the teaching of nursing to a greater extent than those behaviors characterizing Situation-Responsive Nursing. One notes immediately the disparity in the degree of emphasis on Nursing Known *a Priori* between Ryerson and School A on the one hand (least emphasis in School A — 41.9%) and Schools B and C on the other (most emphasis in School B — 73.1%). Despite the priority granted Nursing Known *a Priori*, Ryerson faculty are concerned to a much greater extent with teaching for Situation-Responsive Nursing — Nursing as Process than are the faculty in the other schools. Although School A scores somewhat less than Ryerson, the major difference occurs between these two programs and Schools B and C. One might safely conclude that Situation-Responsive Nursing plays a minor role in the nursing curriculum of School B and School C.

TABLE 40

TYPE OF CONTENT CONSIDERED CRITICAL IN THE TEACHING OF NURSING BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty		Type of Content Per cent Distribution of Statements				
		Total No. of Statements**	Situation-Responsive Nursing	Nursing Known *A Priori*	Personality, Professional Attitudes	Other
Ryerson	N=9*	46	39.1	47.8	10.9	2.2
School A	N=16	81	29.6	41.9	23.6	4.9
School B	N=26*	129	4.7	73.1	17.7	6.3
School C	N=30	136	8.8	72.1	16.9	2.2

*One person at Ryerson and five at School B failed to complete this section of the questionnaire.

**Two persons presented six statements instead of five and a few others presented only three or four, thereby decreasing the expected total.

In addition to the nursing content included in faculties' responses of the critical components of nursing performance discussed in the previous paragraph, Table 40 shows the distribution of content classified as personality characteristics which the nurse should have and professional attitudes which should guide her practice. It is in this category of critical behaviors that we find great dissimilarity between Ryerson and School A. Ryerson places least stress on personality characteristics and professional obligations (10.9%) of all the schools, whereas in School A almost one-quarter of the critical components stressed by faculty are of this nature.

Discussion

It is argued here that personality characteristics are not in fact nursing behaviors, but are aspects of the person which have been developing for some time and which at the age students enter nursing, are reasonably well-formed. While the school of nursing program undoubtedly influences personality, it is difficult to view this end as a primary function of the nursing curriculum. Furthermore, in casting the professional attitudes and obligations of the students into a moral code, that is, that she will consider it her duty to be guided by the code, we are again asking for a type of person who already has

the basis in his or her life for responsible and dutiful behavior. In other words, one who views personality characteristics as a major component or critical aspect of nursing performance places the onus for learning to nurse and for being a "good nurse" directly on the shoulders of the student. Such a belief diminishes the responsibility of the teacher which, in fact, coupled with emphasis on professional attitudes and obligations as the moral duty of the student, detracts even further from the function of the teacher as a primary agent in assisting students to learn to nurse.

Findings

Evaluation has been a major concern of the nurse educator for some time as is shown here in the large number of statements of evaluative behaviors which faculty have included as critical components of nursing for students to learn. Table 41 concentrates on statements on evaluation made by faculty and their distribution between the Situation-Responsive Nursing position and the Nursing Known *a Priori* view.

If we reflect on the difference between these types of evaluation statement, we note that in Situation-Responsive Nursing, students consider the consequences of their nursing action with patients and use their findings as feedback in reassessing and replanning for sub-

TABLE 41

TYPE OF CONTENT ON EVALUATION CONSIDERED CRITICAL IN THE TEACHING OF NURSING BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty		Total No. of Statements	Statements on Evaluation		Distribution of Statements on Evaluation by View of Nursing	
			No.	Per Cent	Situation-Responsive Nursing	Nursing Known *a Priori*
Ryerson	N=9	46	8	17.4	4	4
School A	N=16	81	18	22.2	6	12
School B	N=26	129	17	13.2	0	17
School C	N=30	136	36	26.5	5	31

sequent nursing action. Over time this pattern of performance assists the student to continue to learn and to develop her potential in nursing. On the other hand, the evaluation statements of the Nursing Known *a Priori* type, urge the student to know her own limitations and to perform within them and, in the event of an unforeseen problem lying outside her scope of activity, to seek direction and advice from a more qualified person. The way to develop in nursing is to accept criticism from other persons and be willing to keep up with new knowledge. This kind of evaluation activity casts the student in a passive role. It would seem that the prescribed behavior which nurses learn to perform through this type of evaluation results in safe, routine care — often spoken of as the goal of the large institution. We are forced to ask if there might be a greater payoff for sick people and for health services in general if nurses were to examine the results of their performance and venture to seek more effective ways of nursing their patients.

It may be seen in Table 41 that evaluation statements among the faculty of Ryerson are evenly distributed between the two types of nursing; whereas in the other schools, the proportion of evaluation statements related to Nursing Known *a Priori* as compared with Situation-Responsive Nursing rises sharply: twice as many in School A and six times as many in School C. The proportion of statements concerned with evaluation is least in School B; however all of the statements on evaluation in School B belong to the Nursing Known *a Priori* type.

If we combine the critical components in the category of Personality Characteristics and Professional Obligations with the statements on evaluation of the Nursing Known *a Priori* type we have a major category of critical components of nursing performance which are desired within the student herself, i.e. "humility" and "knowing her own limitations". It seems as though once the student has acquired these attributes, she will be able to function successfully. This combination permits us to see more clearly the degree to which faculty place responsibility on the student for learning to nurse and therefore reciprocally withdraw from their role as teacher.

It may be seen in Table 42 that Schools A, B and C value the components of personality characteristics, professional obligations and evaluation behaviors of the Nursing Known *a Priori* type to a much greater extent than does Ryerson. Almost 40 percent of the statements from the faculty of Schools A and C occur in this combined category.

TABLE 42

STATEMENTS ON EVALUATION OF THE NURSING KNOWN *A PRIORI* TYPE AND STATEMENTS OF PERSONALITY CHARACTERISTICS AND PROFESSIONAL OBLIGATIONS BY FACULTY AT RYERSON AND SCHOOLS A, B AND C, 1968-69

Faculty	Total No. of Responses	Personality & Professional Characteristics	Evaluation Statements - Nursing Known *a Priori*	Per Cent of Total No. of Responses
Ryerson	46	5	4	19.6
School A	81	19	12	38.3
School B	129	23	17	31.0
School C	136	23	31	39.7

Discussion

How might one explain this phenomenon? It would almost seem that the demands on faculty in Schools A and C are such that the expectations for student performance by faculty and by others are so high or appear so impossible to attain that faculty's responsive strategy places a large share of the responsibility for learning to nurse on the student. Why do Ryerson faculty not exhort students to professional behavior and to keep within their limitations for safe practice? A variety of reasons comes to mind: For example, the curriculum and expectations are not yet so set as to provide specific measuring rods against which student performance may be assessed and faculty ability in teaching evaluated. On the other hand, Ryerson faculty seem to be operating on the premise that students can learn to assess and to nurse, to evaluate the effectiveness of their care, and to grow in nursing with the kind of teaching provided.

Findings

Lastly, the statements describing nursing content were studied for their mode of expression. Table 43 displays these data indicating the distribution of statements by type of expression — broad behavioral, specific behavioral and global. In considering Table 43 over half of the responses of Ryerson faculty fall within the category of the broad behavioral statement. Whereas in Schools B and C, approximately one-quarter of the critical nursing behaviors come within

TABLE 43

MODES OF EXPRESSION USED TO PRESENT STATEMENTS CATEGORIZED AS NURSING CONTENT BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty	Nursing Content Total No. of Statements	Modes of Expression Per Cent Distribution		
		Broad Behavioral	Specific Behavioral	Global
Ryerson N=9	40	52.5	12.5	35.0
School A N=16	58	39.6	3.6	56.8
School B N=26	98	28.6	15.3	56.1
School C N=30	110	23.6	11.8	64.6

this category. The number of statements within the specific behavioral category is approximately the same for each school with the exception of School A. Global statements not particularly related to nursing abound in all programs with over half of the responses of faculty in Schools A, B and C occurring within this category.

Discussion

With respect to the mode of expression of statements, specific behavioral statements seem to be of too precise a nature to stand for critical behaviors which pervade the whole curriculum. On the other hand, global statements — non-nursing in content — appear vague and at best, ideal aspirations which really cannot guide teaching or provide a structure for learning. A broad behavioral statement reflects a major aspect of nursing described in more detail; it could be viewed as a focus for the teaching of nursing throughout each year of the program.

SUCCESS AND FAILURES IN THE TEACHING OF NURSING

QUESTION II

> In looking at the students who are about to graduate, what have they learned well that this program has tried to teach them?

What have they failed to learn or in what respects are you disappointed with their present performance or behavior?

Having gathered some evidence on the nature of nursing taught in the four programs, it seemed reasonable to inquire about the effectiveness of faculty in the teaching of nursing. In evaluation, do faculty consider the progress of students in relation to the critical components of nursing described previously?

It may be noted in the following tables that the number of faculty responding in each school is less than in previous questions. In some cases faculty members were new to the program and had insufficient knowledge to respond; on the other hand, some faculty teaching in the beginning courses have little or no information on the performance of senior students.

Table 44 shows that the proportion of *Failed to Learn* responses in relation to *Learned Well* responses increases sharply from Ryerson through Schools A, B and C. Teachers at Ryerson indicated almost four times as many *Learned Well* items as *Failed to Learn* items, whereas School B has the highest incidence of items describing failures in learning. We might surmise from these data that the faculty at Ryerson are more satisfied than the three other schools with the graduates of their program. However, the Ryerson program

TABLE 44

PER CENT OF STATEMENTS DESCRIBING WHAT STUDENTS HAVE LEARNED WELL AND WHAT STUDENTS HAVE FAILED TO LEARN BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty	Total No. of Statements	Per cent of Statements	
		Learned Well	Failed to Learn
Ryerson (N=5)	14	78.57	21.43
School A (N=13)	52	73.1	26.9
School B (N=22)	94	60.64	39.36
School C (N=17)	75	70.67	29.33

is new and therefore has had less opportunity to observe senior students. The faculty of School B appear most concerned with what their students have not learned. Of the four schools, School B is more

closely allied with the hospital and is only now in the process of revising and developing a new curriculum. It is interesting to note that of the four different types of nursing program in this study, it is in the traditional three-year hospital-type program that faculty perceive the greatest failure of students to learn the essential components of nursing practice.

The intention was to use the category system generated by the content analysis of the critical components of nursing performance in the previous section to consider the content of responses to know what students have *Learned Well* and *Failed to Learn*. Similar to the critical components of nursing outlined in the previous section, faculty, mentioned a number of personality characteristics and professional attitudes and obligations as having been learned well or not learned; however, the remainder of the responses fell into quite different categories. With the exception of Ryerson, the largest single grouping for the other three faculties describing what had been *Learned Well* has been classified as *Psychosocial Behavior* — treating the patient as an individual, communicating with the patient and family, etc. For the most part these statements were general in nature and cliché-like in their presentation. Of the *Failed to Learn* responses, the largest single grouping for all programs could be described as manual and technical skills in routine care. The majority of these statements were exceptionally specific in character, i.e. difficulty with aseptic technique, Kardex not kept up to date, etc. A second category of response for what students have *Learned Well* was termed *Thinking and Knowing Behavior*, i.e. a knowledge of growth and development, applies principles, etc. Responses in this category were both general and specific. Examples of responses in each of these categories follows:

Learned Well and Failed to Learn—
Responses from Faculty at Ryerson and in Schools A, B and C
Personality and Professional Attitudes

"Adaptability, broadmindedness, flexible."
"A desire for excellence in nursing standards."
"Professional image seems distorted, standards tend to become mediocre, giving of self not always too evident."
"Some have failed to develop or maintain a concept of professionalism — e.g. grooming."
"No major disappointments but it would be nice if students could learn to do what they know, e.g. walk more purposefully in the clinical area. This I do not believe is totally related to

the program but involves a general attitude toward life and work which appears acceptable today."
"The only thing that really troubles me, and I suppose it is because of my middle age state, is their often lack of respect and little acts of discourtesy to staff and to each other. People probably are not as polite and considerate as they were when I was 18-19-20?"
"Not enough motivation to learn on their own and find out as much as they can. At times although they demand more responsibility and freedom, they don't accept the consequences of their actions."
"Dedication to nursing the hospital patient."

Learned Well Responses

Psychosocial Behavior

"Their care is patient centered, rather than job centered."
"To treat each patient as an individual with his own particular needs."
"They appear to have some skill in interpersonal relationships as shown by their understanding of patients' needs, their willingness to take time from physical skills to talk to patients and the skill with which they do communicate."
"Have learned communication skills, . . . acceptance of the patient as an individual."
". . . , to be alert to psychosocial needs."
"Feeling for people — giving individualized care and talking with people without having to do something physical."
"Really seem to be able to identify psychological implications of illness, and its effect on patient and family."

Thinking and Knowing Behavior

"Ability to discuss problems — seek answers by asking. . ."
"To use scientific principles in planning nursing care."
"An ability to think. . . ."
"Ability to apply patterns in handling nursing situations — e.g. administration of a new drug — what is it, etc. — assessment of the individual nursing care plan."
"Ability to think through approach to nursing care."
"Problem-solving — all behaviors."
"Assessment of needs based on Maslow's hierarchy."
"Many have developed good inquiring minds, will question, want to know answers and will try to find them."

Failed to Learn Responses

Care — Routine, Physical and Technical

"I have seen two students make medication errors."

"Manual abilities such as nursing procedures. I also see some weakness in administration of medications."

"Some seem to be hung up on 'psychological care', but fall down when it comes to providing good nursing care on a physical basis. Many 'tune out' when this is discussed."

"Many have only an adequate knowledge of drugs, and mathemathics involved in calculating drugs."

"I have heard head nurses say that they do not know how to assist a physician with a special procedure such as lumbar puncture, etc."

"I do see the occasional student (i.e. three or four) who become 'sloppy' in her approach to medical asepsis — starts taking shortcuts, so obviously has not accepted fully all our concepts and philosophy as presented."

"Obsession with following procedure rather than principle."

"They have not achieved a good integration of the nursing care involved in their patients, e.g. if a patient was on a diuretic if Intake and Output were not ordered, they would not put the patient on this."

Table 45 presents the proportional distribution of responses of what students have learned well and Table 46 of what students have failed to learn. The eleven statements of Ryerson faculty in the *Learned Well* area are divided between Personality and Professional Characteristics and Thinking and Knowing Behaviors.

Table 45 indicates that with the exception of Ryerson, faculty of the other three schools believe that students are most successful in learning those aspects of nursing which might be classified as Psy-

TABLE 45

PER CENT DISTRIBUTION OF WHAT STUDENTS HAVE LEARNED WELL BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty	Total No. of Responses	Psychosocial Behavior	Personality & Professional attitudes	Thinking & Knowing Behavior	Other
Ryerson	11	—	45.5	54.5	—
School A	38	34.2	31.6	21.0	13.2
School B	57	31.6	21.0	15.8	31.6
School C	43	53.5	11.06	11.6	23.3

chosocial Behavior. In second place, they believe students have acquired the qualities of personality and professional attitudes characteristic of nursing. With the exception of Ryerson, success in Thinking and Knowing Behavior does not achieve a high rating. The per cent of behaviors in School B marked Other, 31.6, requires explanation. Of all the programs, the faculty of School B was the only group who described in the *Learned Well* category a large number of items related to achievement in basic nursing skills. A few examples from their responses follow:

> "They have a degree of nursing skill (not in all aspects, but in many of the essentials and basics)."
> "Many of them are very thorough in their nursing care, paying attention to small details."
> "How to cope with many patients, few staff, fewer supplies and antiquated equipment."
> "To a degree students, I believe, have learned the basic fundamentals in giving nursing care as well as a beginning staff nurse."

In considering Table 46 it is readily apparent that faculty perceive the majority of student failures to learn in the categories of *Care — Routine, Physical and Technical* and *Personality and Professional Attitudes*. In fact, discounting Ryerson owing to the small number of responses, over 80 per cent of the responses from the other three schools are included in these two categories.

Discussion

If we examine the examples of responses describing the performance outcomes of the students, we note particularly that what students have learned well is presented in very general terms and what students have failed to learn is stated in discrete and specific phrases. One of the questions which these data suggest becomes evident: Why do faculty tend to describe the *Learned Well* performance outcomes in general terms, whereas they are much more apt to describe the *Failed to Learn* outcomes in specific terms? Although the cliché-like phrases were similar to those indicated as critical components of nursing performance, the specific-type statements describing what students failed to learn were not representative of the major components in the curriculum as listed by respondents in the previous section.

Let us relate these findings on successes and failures to student evaluation. Evaluation on the negative or wanting side focuses on specific activities related to physical, technical and routine care, and on the positive side to general statements pertaining to the psycho-

social needs, interpersonal aspects and communication. One might wonder about the value of such assessment to the student in learning

TABLE 46

PER CENT DISTRIBUTION OF WHAT STUDENTS HAVE FAILED TO LEARN BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty	Total No. of Responses	Care-Routine, Physical, Technical	Personality & Professional Attitudes	Other
Ryerson	3	33.3	—	66.7
School A	14	28.6	57.1	14.3
School B	37	37.8	43.2	19.0
School C	22	5.0	36.4	13.6

STRENGTHS AND DRAWBACKS OF PROGRAMS FOR TEACHING AND LEARNING

To conclude this section on the study of faculty each member was asked her views of the program in which she was teaching.

Question III

> What would you identify as the five major strengths and the five major drawbacks of the nursing program here? (Where you are presently employed).
>
> a) as a setting in which to teach nursing;
>
> b) as a setting in which students learn to nurse.

Analysis of the responses yielded some common strengths and drawbacks both for faculty and students across the four programs:

Faculty — expectations for leadership
workload and hours of work
group and team work

Students — freedom and independence in learning

Strengths and Drawbacks of the Program as a Setting in Which to Teach Nursing

In all programs teachers cited leadership strengths as:

Freedom to try out new ideas, to plan and to teach as one

wishes, to experiment with new methods, to make decisions, to be creative, to develop and change the curriculum; permissive, encouraging, progressive, interested leadership in which ideas are sought, respected and valued and support, guidance, encouragement and responsibility given.

Drawbacks to leadership had common features:

Lack of strong, involved leadership, lack of organization and of coordination; lack of job descriptions, of clarity of overall goals, of curriculum definition, of relation between responsibility and authority for the teachers; inconsistencies in expectations of students and of standards for evaluation, lack of guidelines for student performance and of policies re failure; curriculum highly structured, rigid, change slow, conservative and controlled with much red tape *or* constant change and continual revision of curriculum without assessment; insufficient direction and explicit guidance, lack of encouragement, support, and evaluation of teaching ability.

Group and Teamwork Strengths as:

Variety of expertise, sharing of ideas, team spirit, cooperation and support among staff; group decisions and control over planning.

Group and Teamwork Drawbacks were:

Too much democracy, too many meetings, teachers unprepared, some do not assume responsibility in group, frustration in gaining consensus or insufficient consensus, results in unproductive meetings; slow decision-making, decisions delayed and then made in haste; group working together does not provide for flexibility, decreases individual responsibility and personal fulfilment, relations become strained, lack of cohesiveness is a problem.

Table 47 indicates that Ryerson faculty perceive a number of strengths related to the leadership of the program and a few concerned with group and teamwork; as yet they have experienced no drawback in either. Despite the number of drawbacks in the other programs, strengths exceed drawbacks for leadership in all cases, but in only one for group and teamwork.

In presenting the strengths and drawbacks of the program for teachers of nursing, work load and hours of work were frequently mentioned. The following table provides a rough estimate of the num-

TABLE 47

STRENGTHS AND DRAWBACKS OF THE PROGRAM AS A TEACHER OF NURSING BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty		Leadership		Group and Teamwork	
		Strengths	Drawbacks	Strengths	Drawbacks
Ryerson	N=9	13	—	4	—
School A	N=16	19	12	8	8
School B	N=26	18	16	7	14
School C	N=30	25	10	17	12

ber of faculty who commented on flexibility of hours of work, time to plan and prepare, and lack of time and heavy schedule. Here we note that of 88 persons, only four Ryerson faculty report time for planning and preparation of work. The amount of work required and the time to accomplish it does not present a problem to the majority of faculty in School B, whereas 11 of 16 in School A and 11 of 30 in School C find the demands of the jobs excessive in view of the time available.

TABLE 48

STRENGTHS AND DRAWBACKS OF THE WORKLOAD FOR FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty	Strengths		Drawbacks
	Flexibility of Hours of Work	Time to Plan and Prepare	Heavy Work Load Lack of Time &
Ryerson N=11	1	4	1
School A N=16	4	0	11
School B N=31	0	0	6
School C N=30	3	0	11

Although permitted flexibility in their hours, faculty convey the impression that the expectation for long hours of work has not changed. In another question discussing satisfaction with their jobs,

the subject of hours of work was noted particularly in Schools A and C. Typical comments from faculty follow:

Ryerson — "Freedom with respect to time of work other than class, clinical, committee and other scheduled time."

School A — "Flexibility — on honor system with respect to hours of work."

School B — "No mention of hours of work."

School C — "On the honor system."
"No one checks up if you leave an hour early, we are *not* policed."

Discussion

In School B, faculty are unconcerned with flexibility of hours; they probably assume a set number of hours of work daily. Ryerson's lack of concern with flexibility in hours of work may derive from the general policy of the Institute that faculty are employed to do a job and that their success rests on performance.

Strengths and Drawbacks of the Program for the Student Learning to Nurse

Strengths and drawbacks for the student learning to nurse focus on the notion of freedom to learn; from the viewpoint of many faculty, a situation pregnant with potential conflict for the student. *Freedom to Learn* as perceived by teachers may be a mixed blessing for the student and a critical factor in the production of role confusion for the teacher. Teachers cite as strengths related to freedom to learn:

> A permissive, democratic atmosphere in which students are free to express themselves in words and actions, to think, to question, to criticize, to be involved and to participate in planning their program, in setting policies, and in developing individual and group learning experiences; a setting in which students grow and develop in their own way, take responsibility for their own learning, prepare for and take part in classes and assess their own performance.

Drawbacks related to freedom to learn:

> Too much freedom may confuse or confound students, many find freedom difficult to accept and use, many do not take

responsibility to learn to become self-directing and independent; if student is not accepted as a learner by faculty, freedom to learn is meaningless; residence life detracts from process of becoming self-directing; many cannot cope with the speeded-up programs — much theory to be learned, committed hours, rigid structure of curriculum plan; teachers support many students to help them learn enough to stay in program, they are protected from failure; inadequate promotion structure.

TABLE 49

STRENGTHS AND DRAWBACKS OF THE PROGRAM FOR A STUDENT LEARNING TO NURSE BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

Faculty	Freedom to Learn	
	Strengths	Drawbacks
Ryerson N=9	11	2
School A N=16	15	14
School B N=26	9	29
School C N=30	39	38

Examples of Strengths of Program for a Student Learning to Nurse
Responses from Ryerson and from Faculty of Schools A, B and C

"Freedom to think and express."
"Students are free to live their own lives and are evaluated only on their ability to perform."
"Students participate in program planning."
"Encouragement to develop according to own 'lights'."
"Students are free to question or differ with opinions of teachers, and in most cases can do so without danger of recourse or feeling threatened."
"Involvement, self-direction, individual strengths fostered."
"The student right from the beginning is encouraged to participate, demonstrate, communicate, in other words to modify her behavior."
"Students are involved in their own learning and much of the responsibility for learning is hers."
"Errors are permitted."

"Objective evaluations."
"Students are treated as mature people."
"Live and move in an atmosphere of permissiveness and self-direction."
"Objectives written and presented to the student, gives her opportunity to do preparation and participation."

Examples of Drawbacks of Program for a Student Learning to Nurse
Responses from Ryerson and from Faculty of Schools A, B and C

"At times there is too much diversity of interpretation of the concept of self-direction, i.e. what it is and how it is effected."
"Because of change to two years, students have even greater responsibility for learning and clinical lab hours not adequate for good skills to develop."
"Students have quite a lot of committed hours."
"Teachers tend to be generalists rather than specialists, thus are often almost as much a learner (that is, a learner at the same level) as the student."
"Too easy for a weak or unconscientious student to fall by the wayside due to self-direction."
"A student always has a teacher with her. How will this affect her ability to take responsibility?"
"Are limits well-enough defined?"
"Inconsistencies about discipline and self-direction."
"Terminal behaviors not clearly defined."
"Immaturity of students makes acceptance of freedom difficult in two years."
"We need perhaps to offer more help in the methods of managing the freedom offered."
"Sometimes students are protected and coddled from failure."
"Too much theory, too little practice."
"A lot of confusion about student role and level of maturity."
"Need more student involvement in planning program — how much?"
"I can't think of any outstanding major drawback (from a student's point of view) except *maybe* — the technique of evaluation which tends to make the student see the teacher as a 'spy', that is, the teacher is seen as working around to detect *ineffective critical incidents* — to plot the rating on the rating scale!"
"Unrealistic counselling, resulting in supporting students who should really leave."

Discussion

Table 49 indicates that in general each faculty member mentioned a strength and a drawback in the program relating to the notion of *Freedom to Learn* for the student, with the exception of drawbacks stated by Ryerson faculty and strengths by the faculty of School B. From the responses of faculty in Schools A, B and C, one has the distinct impression that the student is free to learn or not learn some body of knowledge and to apply it in known ways to reach specific objectives established by faculty. If the student does not measure up to a given set of criteria, then she must leave, or as often happens, faculty members work individually with the non-achiever to maintain her in the program. It would appear that such practices encompass, not freedom to learn in nursing, but the antithesis, the necessity to meet predetermined criteria and given standards. Surely the practice of learning factual material, knowledge or theory by oneself is not based on the concept of "freedom to learn", "accepting responsibility for one's own learning", or "developing one's independence". There is no freedom involved: What is to be learned is given! Some teachers remark or suggest that in this type of program they as teachers have no function. It would almost seem so.

The strengths of the program — freedom to learn, responsible and independent behavior, and participation in curriculum planning and policy-making, are spoken of as though they are naturally taken on by students as part of the developmental process. The idea that the teaching of nursing is directly concerned with assisting students to practise these behaviors as they relate to learning to nurse escapes all but a few faculty members. In stating the strengths and drawbacks of their program, some faculty ask such critical questions as:

> "What is self-direction and how is it effected?"
> "The student always has a teacher with her. How will this affect her ability to take responsibility?"
> "Are limits for the student well enough defined?"
> "Do we need to perhaps offer more help in the methods of managing the freedom offered?"
> "Need more student involvement in planning program — how much?"

The problem of faculty in utilizing the concept of "freedom to learn" is further evident in the responses relating to the strengths and drawbacks of the leadership in their program. Drawbacks with leadership seem to reflect the same problems in faculty as faculty perceive in students, i.e. not accepting responsibility and the freedom

to develop on their own. Most of the drawbacks express the desire for stronger leadership, for definite goals and objectives, for a well-planned curriculum structure to meet them, and for an evaluative framework to assess the results. In addition, many comments castigate the administrator of the program for failing to evaluate the work of the teachers and to identify their strengths and difficulties. It would seem that these types of request reflect problems in achieving one's own independence in the area of responsibility as well as in using the freedom granted the teacher.

Conclusion

An analysis of the content of responses by faculty to questions relating to the critical components of nursing performance, the learning outcomes of the students, and the strengths and drawbacks of their programs, suggest that Ryerson faculty do emphasise *Nursing as Process* and stress the development of this approach to nursing in their teaching and evaluation. They appear to be preparing nurses to function in a variety of situations with the tools to continue to develop in the practice of nursing. School A is more similar to Ryerson than to Schools B and C; in many respects, Schools B and C differ radically from Ryerson and School A. They emphasize to a much greater extent the learning of some body of givens both in knowledge and skill and stress in their teaching the preparation of safe practitioners who know their limitations.

PART III

HOW DOES THE SYSTEM WORK?
TEACHING OF NURSING

CHAPTER 9

THE CLINICAL FIELD

From the viewpoint of faculty, what are the strengths and drawbacks of the clinical field both for teaching and for learning?

What is the nature of the clinical field which the cooperating agencies* provide?

> What is the response of the cooperating agencies to the Ryerson program, its faculty and students?
> What factors do cooperating agencies consider in providing a setting in which students learn to nurse?
> To what extent are their approaches to the teaching of nursing similar to those of the Ryerson faculty?

We have assumed in this study that the clinical field is a potent force influencing students as they learn to nurse, for actual models of nursing practice provide a powerful stimulus to learning. The response of the cooperating agency to the student's program, the reception of students in the clinical field, the nature of the practice of nursing in the institution, the climate for learning, the prevailing notions of teaching, and the well-being and satisfaction of the staff in providing their services all contribute to maximize student learning. Our task was to obtain information on these topics as a basis for describing the nature of the influence of cooperating agencies on the learning process. In addition, it behooved us to compare these responses with faculty's notions of nursing and teaching practices to identify areas of reciprocal support, undoubtedly interacting to augment the goal - directedness of student learning, and, on the other hand, areas of inconsistency, introducing conflict for some students and more varied and diverging viewpoints for others.

A variety of methods was used to learn about the clinical fields. In discussing strengths and drawbacks in the four nursing programs,

* The five hospitals which cooperate with Ryerson in the provision of clinical facilities for student learning.

faculty presented their views of the clinical fields in which they teach and in which students learn. Observation, informal discussion, group interview and questionnaire were used with nurses in the agencies cooperating with Ryerson. Nursing staff in these agencies completed two of the same questionnaires given to faculty, the Nursing Approach Scale and the Learning to Take Responsibility Instrument. Another questionnaire elicited information on how both nurses in the cooperating agencies and students at Ryerson and in Schools A, B and C respond to nursing problems.

Strengths and Drawbacks of the Clinical Field According to Faculty

Method

Data relating to the clinical field were provided by faculty in their discussion of the strengths and drawbacks of their program both for teaching and for learning.*

Findings

Table 50 indicates the number of strengths and drawbacks attributed by faculty to the clinical field. Of the eighty-one respondents in these four schools of nursing and of their approximately sixteen hundred responses describing the strengths and drawbacks for teaching and for learning in each of the nursing programs, only 111 responses or 7 per cent refer to clinical facilities in which students learn to nurse. Fifty-five statements describe attributes and fifty-six disadvantages or problems in clinical facilities. Assuming the importance of the situation in which the student learns, it seems ironic that the clinical field received such short shrift from faculty. It is almost as though clinical facilities are viewed by faculty as one of the "givens" in the program.

Ryerson has had to negotiate for clinical facilities with hospitals and agencies since the program began in 1964. Although a degree of stability in one or two facilities obtains at the present time, the clinical field for student learning remains problematic at best. Also in School A, a great deal of planning with respect to clinical facilities was carried out preparatory to the establishment of the School. Although School A may now be experiencing uncertainty and conflict of interests with other groups regarding clinical facilities, they did have a period of relative stability. Schools B and C use the facilities of one particular hospital complex; School C at the time of the study has

* Analysis of the remainder of responses by faculty to this question is included in Chapter 8.

TABLE 50

STRENGTHS AND DRAWBACKS OF THE CLINICAL FIELDS BY FACULTY AT RYERSON AND IN SCHOOLS A, B AND C, 1968-69

		Availability*	Quality**	Working*** Arrangements	Total
Ryerson	Strengths	3	—	2	5
	Drawbacks	—	1	11	12
School A	Strengths	9	—	—	9
	Drawbacks	4	7	6	17
School B	Strengths	13	1	2	16
	Drawbacks	2	—	8	10
School C	Strengths	10	—	15	25
	Drawbacks	8	3	6	17
TOTAL	Strengths	35	1	19	55
	Drawbacks	14	11	31	56

*Availability — variety of type of facility: attributes, amount, location and timing.

**Quality — appropriateness of facility: quality of nursing and other services organization of care, and guiding policies and directives.

***Working Arrangements — travel distance and relations with hospital or agency staff.

achieved a greater degree of autonomy from hospital control than has School B. The outcome is that Ryerson and School A use clinical facilities in a variety of settings; whereas Schools B and C have their major facilities close at hand. It is readily seen in the ratios below that Ryerson and School A have more problems with clinical facilities than do Schools B and C. In fact, concern with clinical facilities would appear to be proportional to the degree of control over the procurement of these facilities. The evidence for these findings may be seen in the ratio of combined strengths and drawbacks of clinical facilities to the number of faculty in each program:

Ryerson	—	1.9
School A	—	1.6
School B	—	1.0
School C	—	1.4

School B, most closely associated with the hospital setting, is least concerned with clinical facilities and portrays proportionally the greatest strength in this area. It is interesting to note that the closer the affiliation of the school with the hospital, the less the concern of faculty with clinical facilities for student learning. Are clinical facilities more satisfactory because faculty's views of nursing and their expectations of student performance are more similar to those of the nursing service staff than one might find in a situation where the school is further removed from hospital influence? Or, on the other hand, are students perceived more a part of the nursing staff and therefore of less concern to the school? Ten teachers at Ryerson and School A commented on the advantages to be gained when students are exposed to a variety of facilities. The implication was that there is much to be learned through adapting to differing physical settings and varying ways of doing things, i.e. procedures. This may be so, but is it not a large price to pay when one is actually searching for situations which reflect more closely the approaches to nursing that faculty aim to teach?

Table 50 indicates that 12, or 9 per cent, of the statements depicting strengths and drawbacks refer to the quality of the clinical facility. It is interesting to note that medical aspects were frequently cited in praising the quality of a facility, i.e. hospital affiliated with the university, progressive medical care, specialists in various fields. It was not uncommon for faculty to praise the clinical facilities in these terms and in the same response, to berate the head nurse for the ineffective organization of her unit, or to bemoan the scarcity of facilities in which to teach unit management as well as patient-centered nursing. A common complaint among one group of teachers was the dearth of patients with problems designated for study by the curriculum. No teacher questioned a curriculum which failed to deal with the reality of patients who are in that particular hospital. If nursing is a response to some of the most common needs of persons in health and illness, might we not question a curriculum based on that which is infrequent and scarce?

Drawbacks in working arrangements predominate at Ryerson and in School A: travel distance in most instances accompanied by social distance between faculty and nursing staff of the cooperating agencies. The strengths in School C reflect the cooperation of the nursing staff in assisting faculty to initiate a new type of nursing program.

Discussion

In faculty's consideration of clinical facilities, the large problem of

utilization of clinical fields by various competing professions and their sub-groups was not mentioned nor were questions asked about the appropriateness of clinical fields for teaching nursing in view of the nature of the nursing services provided and the type of nursing practice demonstrated. In general, it would appear that medical criteria are used to evaluate the quality of clinical facilities; wheareas requirements for nursing are said to be either available or scarce, — a quantitative dimension.

The Nature of the Clinical Field

The following section is based on the written responses to a number of open-ended questions and pencil-and-paper tests* by nursing service personnel in the cooperating agencies used by Ryerson. Fifty-four nurses in five hospitals participated in this study: Hospital X — 37 nurses, Hospital Y — 7 nurses, Hospital Z — 5 nurses, Hospital V — 3 nurses, and Hospital W — 2 nurses. A major portion of the Ryerson students' experience in learning to nurse is spent in Hospital X, therefore a greater number of students are placed there at any one time and the students themselves are better known throughout the hospital. Because more persons in Hospital X are involved with the Ryerson program, the number taking part in the study is greater than in the other hospitals. Examples cited are taken from all hospitals, whereas the more specific analysis usually derives from the responses of the nursing staff in Hospital X. The thirty-seven respondents from Hospital X represent nurses working in obstetrics, pediatrics, medical-surgical, recovery room, and operating room, and in the positions of Nursing Office staff — 2, supervisor — 2, head nurse — 12, assistant head nurse — 7, and staff nurse — 14.

The date of graduation of the thirty-seven respondents working in Hospital X range from 1948 to 1964. Sixteen graduated prior to 1960 and twenty-one between 1960-64. Thirty-four received their basic preparation in hospital diploma programs and three in university degree programs in another country. Three persons had taken post-basic study in university and thirteen in clinical and correspondence courses.

Method

The Response of Cooperating Agencies to the Ryerson Program, Its Faculty and Students

The nursing staff in cooperating agencies responded to the following open-ended questions:

*Responsibility Test, Nursing Approach Scale and Creativity in Nursing Test.

1. With respect to the nursing care of patients:
   What kinds of things does the Ryerson student do well?
   Where do her difficulties in nursing patients seem to be?
   Can you account for or explain why Ryerson students seem to have strengths in some areas and difficulties in others?

2. With respect to the nursing program and the curriculum at Ryerson:
   What positive values does it have?
   In your view, where are the deficiencies?
   If you were to suggest improvements, what changes should be made?

3. Would you like to work on permanent staff with graduate nurses from the Ryerson program? Why?
   Would you tend to hire Ryerson graduates in preference to any other group of nurses? Why?

Findings

How do Ryerson Students Nurse?

The thirty-seven respondents from Hospital X made twenty-two comments describing the students' ability in giving general nursing care to individual patients. Eleven persons remarked on the nature of the nurse-patient relationship, — good communication and explanation and excellent supportive care. Five responses noted the students' observational skills and seven their procedural or technical abilities. Four stated that students are competent in instructing and supervising patients; one that they work well with staff; and one that they seem to know what nursing is about.

In describing the difficulties which Ryerson students experience in nursing, eight stated that the students lack confidence, are unsure, and doubt their knowledge. Eight persons suggested that the students' difficulties lie in organization of work. Six indicated that students lack self-discipline, do not take responsibility, are frequently late, and have undue absenteeism. Three nurses thought the students lack initiative and curiosity and three that they are insufficiently precise in handling equipment and in reporting and recording. Three more indicated problems in administering medications and four saw difficulty in relating diagnosis to condition and to problems of care. Two nurses spoke of the students' failure to be speedy and one of their need for a routine in nursing.

In accounting for the strengths and problems that Ryerson students

have in nursing, eleven nurses in Hospital X suggested the need for more clinical experience and more full days in the units. They believe students have difficulty in knowing patients over time and in becoming familiar with the ward setting and its influences on patient care. Four nurses believe that students receive too much supervision and five that there is not enough. Some suggest that teachers are not around when they are needed, while others feel that with teachers around, students cannot learn to be independent. Six persons related students' difficulties in nursing to their belief that the students are not interested in all types of nursing nor in all aspects of care.

Only one comment accounted for the students' strengths in nursing; it was stated that there is a good atmosphere for learning in the Ryerson program.

The Nursing Program at Ryerson

Six responses stated that the program produces persons who do good nursing, have high standards of care, good nurse-patient relationships, and the ability to improve with experience. Four spoke of the program as providing for freedom of action, time to learn theory, to think for themselves and to ask questions; in other words, from their view, a course planned for student experiences and learning. They remarked that the plan permits students to be part of a team on a unit and to be supervised yet take responsibility for their own nursing, i.e. students report errors, report off if ill. Some individual responses follow:

> "It seems to prepare the student to be a better individual and at the same time enables her to be a nurse. It also permits women with other responsibilities to have the opportunity to learn nursing while attending these responsibilities."
> "Gives the student a wide variety of hospitals and this should help in adjusting to different methods."
> "Has more knowledge about community services."

Two nurses said that the program produces confident nurses and one that the ratio of clinical experience to classroom time is satisfactory.

Thirteen persons stated that the program involves insufficient practical experience. Three said that there is no screening procedure and that students are admitted who are unsuited to nursing, i.e. have personal problems or are uninterested in nursing. Two nurses think that more supervision is required to assist students to organize their work, to cope with emergencies, and generally to be practical. Some individual responses follow:

"In a hospital there is lack of uniformity in unit administration, some students might not really be exposed to quality of experience needed."

"On the other hand they have interrupted contact with the hospital environment and the patient in particular, that if they would have to give the total nursing care it would be impossible in a way because of the inconsistency of nursing care and the progress of disease will not be properly followed."

"Several of the students prefer certain shifts, etc."

"Yes, it is in trend with modern schooling to have this form of nursing program but I think it does not result in a conscientious, dedicated nurses."

"I think the students should be able to stay longer in the wards."

The majority of suggestions for improvement in the Ryerson program relate to clinical experience. Of the twenty-four comments, thirteen persons expressed the need for more practical experience.[1] Two stated that the amount of classroom and clinical experience should be equal while one indicated that theory should precede clinical experience in special areas. Three nurses pointed out that students should work full shifts and four that students should have at least a full week of shift experience. Two nurses testified to the value of continuity of clinical experience. They argued that continuity permits the student to assess patient needs over time, to come to know the environment better in which she is working, and to take responsibility for nursing care plans. Approximately fifteen remarks related to the type of supervision and the instructors' ways of working. Five persons hinted at the need for closer supervision and one said that the instructor should work directly in the unit and be there for teaching purposes and the follow-up of students. One person suggested that students work with nurses in the ward and four stated that more demonstration and practice are required, particularly in medicines, dressings, and in drugs and solutions. Individual responses are as follows:

"More qualified instructors."

"More experience in a team leader capacity."

"Patients should have a planned routine, about the order in which work is to be done."

"The patient load should be heavier or when they graduate they will not be able to cope with the responsibilities imposed on an R.N."

Working on Permanent Staff with Ryerson Graduates

Twenty-one of the thirty-seven respondents answered "Yes". Eight

responses indicated that the Ryerson graduate has come from a good training program, that she gives a high quality of nursing care, and that she maintains effective nurse-patient relationships. Five persons stated that Ryerson graduates are good co-workers; they are cooperative and learn quickly, work well and carefully, and demonstrate interest in their work. Five persons qualified their answer in saying that they would work with some of the graduates of the Ryerson program and three pointed out that it would depend upon the individual graduate. Two respondents expressed the belief that nurses themselves could learn from Ryerson graduates because they seem to understand young people. Four persons expressed the desire not to work with Ryerson graduates, three saying that they are inexperienced. Three other persons stated that they did not care or that it did not matter with whom they worked.

Hiring the Ryerson Graduate

Seven persons indicated that they would hire Ryerson graduates because they knew the policies and procedures of the institution. One person said that she would hire them according to their qualifications; she felt they have more theory and with added experience, they would be able to work on a team. Ten persons declared they would not hire Ryerson graduates in preference to others. Seven alluded to the inexperience of Ryerson graduates; one remarking that they could not take on the running of a ward. The remainder believe that it is more profitable to have graduates from different places working together and as Ryerson graduates are similar to other graduates there should be no preference. Four persons said "not particularly" when asked if they would tend to hire Ryerson graduates in preference to others.

Discussion

One cannot help but note the large number of persons, twenty-two out of thirty-seven, who remarked on the students' ability to nurse individual patients, and in addition, the eleven who spoke so favorably of the students' interpersonal skills with patients and her abilities to observe and assess psychological and social influences in patients' needs and care. Many difficulties were expressed but they varied from one respondent to another.

Both the strengths and difficulties of the Ryerson student learning to nurse and the values and deficiencies of the Ryerson program are stated without supporting data and in such general terms that the actual grounding of the ideas is not evident. As may be seen by the suggestions for improvement, most persons who indicated that

more practical experience is required did not describe why it was needed or how further experience might be used. One of the major problems seems to be that any comment on the student's nursing, whether of strength or difficulty, relates to her as though she were a graduate, assuming her performance at that point in time to be a valid sample of her final performance as a graduate. In this case, of course, the student must be for the most part inadequate. In suggesting improvements for the Ryerson program, one person did describe in considerable detail the values of continuity of experience over time. This was the only instance in which a respondent from the cooperating agencies outlined the reasons for a suggested change.

Factors Cooperating Agencies Consider in Providing a Setting for Students

Nurses in cooperating agencies were asked to respond to the following questions :

> What part do you play in helping Ryerson students learn to nurse ?
> In what ways is this agreeable or disagreeable to you?
> How well do you know the Ryerson instructors ?
> How could ward nursing personnel and the Ryerson faculty make the clinical situation a better place in which students can learn ?

Eighteen persons stated that they provide guidance and teaching to assist students to apply theory to nursing situations. They do so when students asks for assistance, either the student does not know or is experiencing problems, or the staff member herself feels that assistance is warranted. Sixteen comments indicate that nursing service personnel demonstrate, assist, supervise and answer questions, particularly about procedures. Four persons stated that they assist students to organize their work and four that they help by setting a good exemple, — as a nurse in technical aspects and procedures, as a team leader, and as a professionnal person. Two said that they choose assignments and workloads for students with reference to their needs and those aspects in which they were doing poorly. Individual responses are as follows:

> "Encourage the Ryerson instructor to choose patients whom she thinks the student should nurse."
> "I mostly do all the instructing for the students who come to this particular unit."

"As a head nurse I supervise the students as well and give explanations when needed and show them certain procedures done in this hospital."

"Giving them help when they ask for it."

"Observation of care given and assistance where necessary — explaining reasons — pointing out theoretical learning and showing pratical methods with available equipment, etc."

"To show them the correlation of theory and practice, to be able to understand the needs of patients as related to what they have been taught.".

"Being a good example, and making enquiries among the students with regards to assistance or any difficulties with their assignments."

Eighteen persons stated that the teaching function was most agreeable to them. Responses such as the following were reported :

"It is very agreeable since I feel that these students have presented a challenge to the hospital-trained nurse by keeping her 'on her toes'. They also stimulate my thinking and cause me to be always aware of good technique."

"I enjoy seeing the students progress."

"This is one part of my job description I enjoy. Instruction in a particular area to students interested seems very rewarding."

"This is a very agreeable role because it gives me the opportunity to teach students which is expected of a B.S.N. graduate."

"Teaching role was pleasant change from the usual routine and it was stimulating to be able to apply one's knowledge to a clinical situation."

"It is not disagreeable at all, the students learn from us, we learn from them. I enjoy nursing students very much."

"This is part of our role as a nursing supervisor and I was pleased to pass on any information I could to be of service to them."

Almost no one said that the teaching role was actually disagreeable. However, most persons qualified their statements in the following manner. Nine persons pointed out that they perform the teaching function when the Ryerson instructor is not around or when she requests the staff to take over for her. Six indicated that this function delays their own work and that it is in fact an additional task. As far as most of the staff are concerned, it is satisfactory when there is time. Examples follow :

"Agreeable if not busy."
"I don't mind it — the only thing I don't like about it is the time I spend for it which I could have spent in doing my job for the hospital. In other words, it's an additional task."
"The role is agreeable with responsive students, but occasionally can be disagreeable when pressed for time."
"Sometimes it causes delay in the performance of my own work because you have to spend some time teaching the student who comes to you for help or supervision."
"I find this role very agreeable to me to help the students while I can if there is enough time allocated to do it, but it turns disagreeable when the ward is busy and I would not be able to devote my time to answer about students' doubts regarding patient care".

In portraying how well they know Ryerson instructors, eleven persons responded "quite well", six "fairly well", while twelve stated that they did not know the Ryerson instructors "too well". Of the responses in the "quite well" category, the following statements are typical :

"Just their names, the type of supervision they do and what they expect me to do."
"I know the instructors well — have some discussions concerning the students."
"Quite well — the instructor assigned to the unit is approachable, cooperative and works well with the head nurses, supervisor and staff."

Reasons describing the "not too well" category follow:

"Some are very "unfriendly."
"Instructors come around to supervise their students; this is the only time I see them."

To make the clinical situation a better place for learning, twelve of the responses related to discussion, understanding, working together, and establishing good relations.

"Understand the role expected of the staff nurse, etc., in regards to the student nurses."
"The instructor and the nursing personnel should establish a good and pleasant personal relationship. The instructor can make suggestions to the head nurses or supervisor which the latter should accept if it's for the betterment of patients' care and vice versa."

"By knowing each other's aims or way of how things should be done in the ward for the betterment of the clinical area. Both sides should know the problems in the clinical area so that there is no conflict in giving instructions or helping the students."

"They should work and cooperate together with regards to the supervision of the students."

"I don't think I know enough about Ryerson faculty program so I could make any suggestions."

Many of the nursing staff felt that these ends would be achieved if staff, students, head nurse, team leader and instructor could discuss student needs and the ward situation together. Nursing staff also suggested that more discussion be held between team leader and instructor along with the students and between the instructor and the head nurse to plan together and to identify the difficulties and problems more fully.

Four suggestions for improvement referred to the physical set-up of the ward, — a room for conferences, a place at the desk, ward equipment for procedures and techniques, and a lesser number of students in small units. Eight comments pertained to the type of supervision and the way in which students learn. Many nurses felt that Ryerson students should actually participate as team members in the nursing of the unit and not just nurse in isolation. Some said that there should be more supervision and that instructors should provide assignments for students and then follow up on them. Instructors should be available in mid-morning to reassure students when the load is the heaviest and the students are in greatest need of support. It was emphasized again that instructors should teach students how to organize their work. Some nurses felt that the Ryerson teachers should have more confidence in the ability of the nursing staff to teach.

Under suggestions for improvement, there was one example which related specifically to the nursing staff. A person stated that the staff should set a good example of nursing.

Discussion

In our consideration of the setting which cooperating agencies provide for student learning, the observation which stands out is that nursing service personnel enjoy helping students learn to nurse; they like to teach. Such statements were made by practically every respondent and written in such a way as to indicate their satisfaction

in working with students. However, they do not view these activities as part of their job; they are extra, additional, they occur when the instructor is not present, they are not planned, discussed or developed. In a sense this function has a negative quality; the nurse helps the student when the student does not know, when she has a problem, when she is doing something incorrectly, or when in general, she requires assistance. From the viewpoint of most nurses, their function in student learning should be to parallel that which the teacher carries on when she is present. Of the whole group, only four nurses mentioned that by setting a good example they supply a model of nursing for the student, and one person described the responsibility of nursing service to provide an environment conducive to learning. Although the quality of nursing in the unit was not identified as the critical responsibility of nursing service, the necessity for sufficient supplies and the availability of staff persons to answer questions were cited.

The prevailing recommendation in suggestions for improvement focuses on the need for greater communication; to talk more together so that the nursing staff and the Ryerson teachers will understand their mutual problems and expectations. It seems that the nursing staff view greater participation of the student in the nursing activities of the unit as an effective approach to learning. On the other hand, the staff feel that the teachers do not share this belief and therefore do not foster a learning-teaching relationship between student and staff. From the viewpoint of the nursing staff the practices of the instructor are clear; instructors are in the ward for short periods of time, they come in and out to supervise the students, and, therefore, much of the job of supervision remains for the staff to do.

Teaching of Nursing in Cooperating Agencies

To provide comparative data on approaches to the teaching of nursing, nurses in cooperating agencies responded to two of the same instruments completed by faculty, the Learning to Take Responsibility Test and the Nursing Approach Scale. A description of the purposes and methods of the Responsibility Test may be found in Chapter 7 and of the Nursing Approach Scale in Chapter 5.

Teaching Students to Take Responsibility

The Responsibility Test[2] indicates the extent to which one favors responsibility through direction or to some authority ("Accountable to") as compared with responsibility through problem-solving ("Accountable for") behavior in nursing the individual patient and

in nursing at the team, unit or institution level. The results are presented below for Ryerson faculty and for cooperating agencies in which five persons or more participated.

Findings

It may be noted in Table 51 with reference to nursing the individual patient that Ryerson faculty score higher in "Accountable for" behaviors than do nurses in Hospitals X, Y or Z. There is

TABLE 51

MEAN CATEGORY SCORES FOR RESPONSIBILITY BEHAVIOR IN NURSING EMPHASIZED BY FACULTY AT RYERSON AND BY NURSES IN HOSPITALS X, Y AND Z, 1968-69

Categories of Responsible Behavior and the Nursing Context	Ryerson R=11	Hospital X N=25*	Hospital Y N=7	Hospital Z N=5
"Accountable for" Behaviors directed toward Nursing the Individual Patient	4.30	3.4	3.0	3.6
Team, Unit or Institution Nursing Behaviors	3.24	3.1	3.1	3.3
"Accountable to" Behaviors directed toward Nursing the Individual Patient	3.2	3.2	3.4	2.5
Team, Unit or Institution Nursing Behaviors	2.45	2.4	2.5	2.7

*Six persons did not complete the questions and six failed to follow instructions.

much more similarity of score in the "Accountable to" behaviors with the exception of Hospital Z, which rates responsibility through direction less than the others. There is more agreement among Ryerson faculty and Hospitals X, Y and Z in responsibility behavior at the Team, Unit or Institution Level, with Hospital Z achieving the highest scores both for "Accountable for" and "Accountable to" behaviors. Table 52 indicates the combined categories for responsibility behavior and again illustrates the greater adherence of the Ryerson faculty to "Accountable for" behavior and to nursing directed toward the individual patient.

TABLE 52

COMBINED CATEGORIES OF RESPONSIBILITY BEHAVIOR IN NURSING EMPHASIZED BY FACULTY AT RYERSON AND BY NURSES IN HOSPITALS X, Y AND Z, 1968-69

Combined Categories of Responsibility Behavior	Ryerson N=11	Hospital X N=25	Hospital Y N=7	Hospital Z N=5
"Accountable for" Behavior directed toward Individual and Team, Unit or Institution	7.54	6.5	6.1	6.9
"Accountable to" Behavior directed toward Individual and Team, Unit or Institution	5.65	5.6	5.9	5.2
"Accountable to" and "for" Behavior directed toward the Individual Patient	7.50	6.6	6.4	6.1
"Accountable to" and "for" Behavior directed toward and Team, Unit or Institution	5.69	5.5	5.6	6.0

Discussion

In interviews with nurses in the cooperating agencies it became increasingly clear that one of the major concerns in the new program was that the profession continue to prepare nurses to takes responsibility. Identifying two major approaches to this task — taking responsibility by responding to direction or to some authority, or on the other hand, to developing a problem-solving approach — we set out in this project to compare how the Ryerson faculty and the nurses working in the clinical field influence or teach students to become responsible. The findings here suggest that the Ryerson faculty are fostering a problem-solving approach to responsibility to a greater extent than are nurses in the cooperating agencies. However, at the same time, the Ryerson faculty follow the pattern of responsibility through direction or to an authority as exhibited in the cooperating agencies by assisting students to employ the policies and procedures of the situation and to perform within the direction of the unit. It is evident that the teaching of nursing by Ryerson faculty is directed more to the individual patient than that

of nurses in the field. Futhermore, with the exception of Hospital Z, Ryerson faculty are more concerned with nursing directed toward the team, unit or institution level. In searching for a field in which to teach a problem-solving approach to responsibility in nursing, it would seem that Hospital Y is least similar to the Ryerson faculty in this respect. Hospital Z would support this approach more than the other cooperating agencies, and, in addition, appears to be the most attractive setting for the teaching of nursing at the team, unit or institution level. Hospital X, the clinical field used to a great extent for the teaching of Ryerson students, permits greater emphasis on nursing directed toward the individual patient.

Teaching the Valued Aspects of Nursing: The Nursing Approach Scale

The literature describing "today's" nurses, nursing and preparation of nurses was compared and contrasted with that describing an "earlier" period. Qualities and characteristics of both were utilized to construct a questionnaire to provide a "values picture" of the individual nurse based on her choice of action in a variety of nursing situations.[a]

Table 53 permits us to compare the mean scores on the Valued Aspects of Nursing Test for Ryerson faculty and for nurses in the cooperating hospitals. It may be noted that the score of Hospital Z

TABLE 53

MEAN SCORES ON THE NURSING APPROACH SCALE FOR RYERSON FACULTY AND FOR NURSES IN HOSPITALS X, Y, Z, V AND W, 1968-69

Institution		Score
Ryerson	N=11	57.1
Hospital X	N=37	41.4
Hospital Y	N=7	44.3
Hospital Z	N=5	56.0
Hospital V	N=3	46.3
Hospital W	N=2	51.0

most closely approximates that of Ryerson while the score of Hospital X shows the greatest deviation. On the basis of 45 as the

median score on the traditional-modern values scale, Table 53 indicates that Ryerson and Hospital W and Z fall within the modern values sector, Hospitals Y and V are in the middle, and Hospital X falls well within the traditional sector of nursing values.

TABLE 54

ANALYSIS OF VARIANCE OF NURSING APPROACH SCORES OF FACULTY AT RYERSON AND OF NURSES IN HOSPITAL X, 1968-69

	Source of Variation	df	Variance Estimate	F
Between	2086.13	1	2086.13	26.18*
Within	3665.88	46	79.69	
Total	5752.00	47		

*F .99 (1,46) = 12.61

The analysis of variance shows in Table 54 the nursing values espoused by the Ryerson faculty to be significantly different from the values of nurses in Hospital X, p. «.001.

Discussion

The nursing values of staff in Hospital Z seem to parallel those of the Ryerson faculty and lend further support to the previous discussion that the clinical setting of Hospital Z most closely approximates the requirements of the Ryerson program as portrayed by their faculty. Hospital X appears to hold values which deviate the most from those which Ryerson faculty support.

Creativity in Nursing

In addition to completing two of the same questionnaires as faculty, nurses in cooperating agencies responded to one in common with Ryerson senior students.[4] In obtaining information about the clinical setting in which students learn to nurse, it seemed reasonable to find out how nurses working in the situation approach nursing problems and to compare their approach with that of the Ryerson senior students. This instrument attempts to measure some of the aspects of creativity in problem-solving; specifically, it looks at the reasons a respondent offers in describing factors which might lead up to a situation, and secondly, at the type of further activity the respondent

would undertake. Senior students and the nurses in cooperating agencies were presented with two problem situations in nursing. They were asked to respond by describing their views of the situation and what they would do.

The data, reasons and activities, were assessed for the frequency of responses and secondly, for the type of approach to action. The approach to action was analyzed to determine if the respondent would investigate the matter further or if she would take a particular action on the basis of the available evidence. It is postulated that the person who asks further questions to learn more about a situation will be open to a wider range of solutions and possibly more creative action than the person who moves rather quickly to a given course of action.

Findings

Table 55 shows marked differences in the responses to nursing problem situations of Ryerson students and of nursing staff in the cooperating agencies. Ryerson students offer more reasons in explanation of problem situations and suggest that a greater number of investigative activities be followed. Tables 56, 57 and 58 portray the significance of the differences between the Ryerson students

TABLE 55

MEAN NUMBER OF RESPONSES TO NURSING PROBLEM SITUATIONS GIVEN BY RYERSON STUDENTS, BY NURSING STAFF IN HOSPITAL X AND BY NURSING STAFF IN THE 5 COOPERATING HOSPITALS COMBINED, 1968

Staff and Students	Reasons	Activities		Ratio Investigation to Action
		Investigation	Action	
Ryerson Seniors I N=7	9.3	3.4	6.4	1:2
Seniors II N=14	9.28	2.43	6.0	
Nursing Staff Hospital X N=37	6.7	.7	5.16	1:10
5 Cooperating Hospitals N=53	6.65	.89	5.07	1:5

and the nursing staff in the five cooperating hospitals. It is noteworthy that the difference is highly significant between the two groups in the number of reasons they offer for the problem situation and in the number of investigative activities they suggest. On the other hand, they propose approximately the same number of actions to solve the problem.

TABLE 56

ANALYSIS OF VARIANCE OF THE NUMBER OF REASONS GIVEN IN RESPONSE TO NURSING PROBLEM SITUATIONS BY STUDENTS AT RYERSON AND BY NURSING STAFF IN 5 COOPERATING HOSPITALS, 1968

Source of Variation	Sum of Squares	df	Variance Estimates	F
Between	94.92	1	94.92	20.61*
Within	331.57	72	4.61	
Total	426.49	73		

*F .999 (1,72) = 7.01

TABLE 57

ANALYSIS OF VARIANCE OF THE NUMBER OF INVESTIGATIONS SUGGESTED IN RESPONSE TO NURSING PROBLEM SITUATIONS BY STUDENTS AT RYERSON AND BY NURSING STAFF IN 5 COOPERATING HOSPITALS, 1968

Source of Variation	Sum of Squares	df	Variance Estimates	F
Between	65.97	1	65.97	31.98*
Within	148.53	72	2.06	
Total	214.50	73		

F* .999 (1,72) = 7.01

Discussion

Faced with a problem situation in nursing, the staff of Hospital X

favor action over investigation to a much greater extent than do students. The paucity of investigative activities amongst staff negates the possibility of reaching more varied paths of action in response to nursing situations. From these findings we must conclude that the nursing staff in the cooperating agencies studied probably fail to provide models suggestive of a creative approach to nursing problems.

TABLE 58
ANALYSIS OF VARIANCE OF THE NUMBER OF ACTIONS STATED IN RESPONSE TO NURSING PROBLEM SITUATIONS BY STUDENTS AT RYERSON AND BY NURSING STAFF IN 5 COOPERATING HOSPITALS, 1968

Source of Variation	Sum of Squares	df	Variance Estimates	F
Between	21.03	1	21.03	3.09*
Within	489.46	72	6.80	
Total	510.49	73		

*F .95 (1,72) = 3.98

Conclusion

In discussing strengths and difficulties of their programs for the preparation of nurses, faculty pay scant attention, only 7 per cent of all entries, to the clinical facilities in which students learn to nurse. The quality of clinical facilties appears to be assessed on medical criteria, nursing criteria are not used for this purpose. According to the nursing staff of cooperating agencies, strengths in performance of the Ryerson students lay within the realm of interpersonal relations and of knowing what nursing is about. The nursing staff believe that their difficulties appear in failures in commitment and responsibility and in not displaying organization and confidence in performance. All strengths and difficulties of Ryerson students are described in general terms without supporting evidence. Problems in the Ryerson program are attributed to insufficient clinical experience, lack of continuity in experience, and the absence of shift work.[5]

The staff of the cooperating agencies enjoy participating in the teaching of students, but view this function as external to their real

job and only to be undertaken when the clinical instructor is absent. They perceive their role as supplementary to the teacher and in no way unique. Less than half the nursing staff indicated that they knew the Ryerson instructor well. All suggestions to improve the Ryerson program were based on the premise that students learn to nurse in the clinical situation. Hospital nursing staff request closer working relations with the Ryerson teachers. This proposal applies not only to increased time for description and discussion of the program and the students' needs, but also that the teachers spend more time in the unit to participate in activities related to the developing nature of the student.

According to our method of assessing "learning to take responsibility", the Ryerson faculty teach students to take responsibility through direction to the same extent approximately as do the nursing staff in cooperating agencies. The disparity between the nursing staff and faculty lies in the emphasis by faculty in teaching students to take responsibility through a rational, problem-solving approach. The nursing staff appear to pay less attention to this method of developing responsibility. The nursing staff in cooperating agencies favor more traditional values in nursing than do the faculty at Ryerson. In Hospital X, where students receive a large proportion of their experience, nurses have the least attachment to modern values in nursing.

In responding to problem situations in nursing, the nursing staff in cooperating hospitals offer fewer responses than do students, fewer reasons to explain why a situation occurs, and fewer actions to solve it. The amount of investigation suggested by staff is negligible.

In this study it would appear that the nursing staff in cooperating agencies express some satisfaction in having the Ryerson students in their field and that a kind of positive relationship exists among staff and students. The staff participate in teaching when problems occur or when the student requires assistance. Although the nursing staff do not perceive themselves as instrumental in the teaching of nursing, one cannot question their role as models of the nurse practitioner. Our study shows from the questionnaire test situation that the nursing practice of staff in cooperating agencies is characterized by responsibility to authority, adherence to traditional values in nursing, and partiality to the known and proven approach to nursing problems.

Footnotes

1 Directors of Nursing but not their head nurses believe Ryerson graduates require "more clinical practice"; see Chapter 10.

2 Learning to Take Responsibility Instrument, Form B. See Appendix.

3 See Chapter 5 for discussion of the *Nursing Approach Scale* and for appropriate references. Details relating to development and validation of the Scale are included in the Appendix.

4 This instrument was used in the study of students at Ryerson and in Schools A and B to assess creativity in nursing. Chapter 6 includes a detailed description of the instrument and its use.

5 See Chs. 2 and 3 for a description of the Ryerson program.

PART IV

EXIT FROM THE SYSTEM

CHAPTER 10

THE GRADUATE IN THE WORK WORLD

Can the young Ryerson graduate "do the work of a staff nurse ? Has her program prepared her for what is expected of her? Is she treated differently from graduates from other types of diploma programs ? How does she compare with these other graduates ? What are her strengths and difficulties ? Does she feel part of the work group ? Is she accepted? How does she "get along" ?

The nursing program at Ryerson may be "new", in that the setting is an educational institution; it may be "different" in emphasis and organization; but the program continues to share responsibility with all other nursing education programs for producing competent professional personnel. The question then follows: Does the Ryerson graduate *fit* into the work world?[1] This broad line of inquiry generated many essential sub-questions which were refined and organized into a series of open-ended interview guides called the *Graduate Battery*.[2] Graduates from three successive years at Ryerson, the Head Nurses with whom they worked and the Directors of Nursing[3] of the institutions which employed them, were interviewed.

It was hypothesized, despite any preconceived ideas about new or shorter programs, that the Ryerson graduate would *fit* into the work world; she would not be treated differently in terms of placement or assignment, she would participate fully in ward life, and her preparation would be such that she would be able to meet the expectations made of any young graduate nurse.

Part I — Placement of Ryerson Graduates

The respondents (the graduates themselves, head nurses and directors of nursing) were first *asked about the placement of the Ryerson graduate within the hospital or agency*. This line of

inquiry produced data relating to the characteristics of a suitable placement, the actual placement, reasons for making this placement, related orientation programs and finally, the satisfying aspects of this placement. These data are summarized in Tables 59 through 62.

When asked: *What was a suitable placement for a new Ryerson graduate,* the Directors of Nursing interviewed stated almost unanimously that any general duty area was suitable.[4] The placement was usually described as a medical, surgical or medical-surgical unit. The only exception was the director of nursing of an obstetrical hospital, who saw the nursery as being most suitable. Table 59 summarizes the characteristics of a suitable placement in the opinion of directors, head nurses and the graduates themselves. Ten of the sixteen directors of nursing felt that a "first" placement should allow the young graduate to gain more general experience, to learn, and to practise the basic nursing skills. Two of the other directors of nursing believed that the graduate should be given the work she likes; and one that she should be assigned to a ward which is "not too busy".

While fewer of the head nurses emphasized the provision of general or basic experience, nine of the sixteen still favored the Ryerson graduate's being placed in a "general" area. Two felt that a suitable placement would provide the young graduate with the opportunity to develop her basic nursing skills, or to grow as a person. Another two felt that the placement should be one that the young graduate had requested, permitting the kind of work she is interested in or is prepared to do. The final two head nurses felt that any area that is not unduly stressful would be most suitable in that it would give the graduate time to "learn to cope". One head nurse had felt that she could not answer the question.

Offering little contrast to the opinions of both the directors of nursing and the head nurses, the belief of the graduates was that a suitable placement would provide a broad variety of experience (fifteen of the twenty-three), the opportunity to be responsible or independent (two), or the chance to avoid work that was unattractive (one). Another three felt that suitability would depend on their own abilities and interests, in that a suitable placement would be one which allows them to do the kinds of work they like, are interested in or are prepared to do.

While the above discussion centres on the characteristics of a suitable placement, the data on Table 60 allow comparison and contrast between actual and suitable placements. The first column

TABLE 59

THE RYERSON GRADUATE IN THE "WORK WORLD" THE OPINION OF DIRECTORS OF NURSING, HEAD NURSES AND THE RYERSON GRADUATES THEMSELVES AS TO SUITABLE PLACEMENTS FOR RYERSON GRADUATES, 1968-69

Characteristics of Suitable Placement	Per Cent Who Reported This Characteristic					
	Ryerson Graduates N=23		Head Nurses N=16		Directors of Nursing N=13	
	No.	%	No.	%	No.	%
It provides young graduates with opportunity:						
1) To gain more general experience, basic experience or variety of experiences.	15	65	9	56	10	77
2) To develop potential to meet future challenges or to develop both inner self and nursing skills.	0	0	2	12	0	0
3) To do kind of work she likes, is interested in or is prepared for.	3	13	2	12	2	15
4) To be responsible and/or independent.	2	9	0	0	0	0
5) To be able to cope with what's going on (i.e. not too busy) and obtain support when necessary.	0	0	2	12	1	8
6) To be able to avoid work she does not like.	2	9	0	0	0	0
7) Don't know, had not thought of it or no answer.	1	4	1	6	0	0

shows actual placement of the Ryerson graduates, the second column, the head nurses opinions of the *most* suitable placement; and the third column, the directors of nursing's view of *unsuitable* placements.

While a high of 87 per cent of the head nurses felt that a "general" unit would be the most suitable placement, a low of 39 per

TABLE 60

THE RYERSON GRADUATE IN THE "WORK WORLD"
PLACEMENT OF RYERSON GRADUATES
AND OPINIONS OF HEAD NURSES AND
DIRECTORS OF NURSING AS TO SUITABLE
PLACEMENT FOR NEW RYERSON
GRADUATES, 1968-69

Type of Placement	Actual Placement of Ryerson Graduates N=23		Most Suitable In Opinion of Head Nurses N=16		Unsuitable in Opinion of Directors of Nursing N=13	
	N	%	N	%	N	%
1) Medical, Surgical or general Medical-Surgical unit	9	39	14	87	0	0
2) Obstetrical unit	1	4	1	6	0	0
3) Other nursing specialties (i.e. Operating Room, Neurology, Psychiatry, Intensive Care Unit, etc.)	9	39	0	0	6	46
4) None (i.e. graduate not working or head nurses and/or directors had no opinion about placement)	3	13*	1	6	6	46
5) Any busy ward	0	0	0	0	1	8

* Includes two graduates at university.

cent of the graduates were actually located on such a ward (Table 61). A paradox then arises in that 46 per cent of the directors of nursing saw as unsuitable, the specialties of nursing to which approximately 40 per cent of the graduates had been assigned. These specialty areas were seen by the directors of nursing as not providing the "necessary" broad or general experience. However, over ninety per cent of the directors of nursing were pleased with the graduates' performance wherever they were placed (Table 61).

The directors of nursing were asked three further questions in an attempt to clarify the problem of placement of Ryerson graduates. First: *Would the characteristics of a suitable placement differ for the Ryerson graduate as compared with the average graduate?* While

TABLE 61

THE RYERSON GRADUATE IN THE "WORK WORLD" DISTRIBUTION OF REASONS WHY DIRECTORS OF NURSING MADE SPECIFIC PLACEMENTS OF RYERSON GRADUATES AND RESPONSE TO PLACEMENT BY THESE DIRECTORS OF NURSING, 1968-69

Reason for Placement of the Ryerson Graduate	Directors of Nursing N=13	
	N	%
1) Need of staff on the unit.	4	31
2) Needed staff on that unit and graduate requested it.	6	46
3) Need of staff on that unit and the head nurse is a good teacher.	2	15
4) Graduate requested non-nursing duties and hospital had opening.	1	8
Response to placement by Director of Nursing:		
1) Pleased with graduate's performance.	10	77
2) Pleased with qualifications.	2	15
3) Not too pleased.	1	8

one of these directors of nursing responded "possibly" or "I think so", and four stated "no" categorically, twelve (94%) of these employers felt that the provision of broad general experience was much more necessary for the Ryerson graduate, or for the graduate of a two-year program, than for the hospital graduate. They stated further that graduates of programs such as Ryerson required further practice in the basic nursing procedures and tasks. [5]

Second, they were asked: *What was the reason for assigning the graduates as they did?* (Table 61) Twelve of the thirteen directors of nursing gave as their basic reason for specific placements, "needing staff on that unit". Eight further qualified this reply by adding that "the graduate requested the placement" or "the head nurse on the unit was a good teacher". Therefore, while

a suitable placement for the young Ryerson graduate, in the view of the directors of nursing, is a general unit to allow broad experience, less than half of the Ryerson graduates had been so assigned.

Lastly, the directors were asked: *Was any special help or instruction given to these young graduates to gear them for their actual assignments?* These were assignments, which according to the directors' own criteria, were not necessarily suitable to the capabilities and/or needs of the Ryerson graduates. Was it therefore necessary to make a change in either a specific or a general way in the orientation program? (Table 62). The directors of nursing were unanimous in that they made no change in the formal orientation program. Eighty-eight per cent of the head nurses agreed that they did not modify their initial ward orientation. One head nurse added to the orientation because the Ryerson graduate had been promoted to the position of assistant head nurse, but a second had to provide extra help and support to a graduate in a staff nurse position.[6] When the graduates themselves were asked, 70 per cent replied that no modification had been made for them, and the other 30 per cent felt that they had received no orientation at all, or that it had been cut down because they had worked in the hospital as students.[7] It would seem then that on the whole, any difficulties which might have arisen because of unsuitability of placement[8] (Table 62) must have been left to the graduate herself to resolve in an informal way rather than through planned learning experiences.

TABLE 62

THE RYERSON GRADUATE IN THE "WORK WORLD"
DISTRIBUTION OF OPINIONS OF RYERSON GRADUATES, HEAD NURSES AND DIRECTORS OF NURSING AS TO TYPE OF ORIENTATION PROGRAM GIVEN, 1968-69

Orientation Given	Directors of Nursing N=13		Head Nurses N=16		Ryerson Graduates N=23	
	N	%	N	%	N	%
1) Usual program, no modification for Ryerson graduate.	13	100	14	88	16	70‡
2) Some modification for Ryerson graduate.	0	0	2	12*	0	0
3) Did not receive any, or orientation cut down because ward was busy.	0	0	0	0	7	30

‡ Includes one graduate who saw orientation as excellent and five who felt it was insufficient

* This includes one graduate who was being promoted to assistant head nurse and one who required extra counselling and support.

On turning to the young graduates themselves, it was discovered that over 80 per cent of them were pleased with their placement. Only two of them were not. Table 63 gives a summary of what the Ryerson graduates found pleasing about their actual nursing placement. Seventy-seven per cent found that the ward presents a learning situation and thirty-nine per cent saw it as giving them an opportunity to develop and grow professionally. Thirty per cent mentioned enjoying relationships with the rest of the staff while 22 per cent of them liked the work itself. Only four graduates mentioned that they were particularly pleased by the freedoms allowed, rotations and time off. Most of the pleasing aspects identified by the graduates then related to other than the extrinsic benefits of the staff nurse position.

TABLE 63

THE RYERSON GRADUATE IN THE "WORK WORLD"
PLEASING ASPECTS OF THEIR PLACEMENT IN THE
OPINION OF RYERSON GRADUATES, 1968-69

Pleasing Aspects of Placement	Ryerson Graduates Identifying This Aspect N=23	
	N	%
1. It is a learning situation (variety of patients, new procedures, conferences, etc.)	18	77
2. It provides the opportunity to develop, to be more competent, allows initiative in giving and planning care ,chance to make decisions.	9	39
3. Good relationships with staff, they listen to suggestions, like and are liked by head nurse and staff.	7	30
4. Enjoys the work.	5	22
5. Extrinsic benefits — not too tiring, allowed freedom in terms of hours, etc.	4	17

* Per cents sum to more than 100% as many graduates identified more than one "pleasant aspect".

Part II — The Graduate Herself

The directors of nursing, the head nurses and the Ryerson graduates were asked three questions:

1) What are the strengths of the Ryerson graduate?

2) What are her difficulties?

3) How does she compare with the hospital graduate?

The answers provide a composite picture of the Ryerson graduate.

(See Table 64 for the summary of responses to questions 1 and 2.) The strengths cited most often by the directors of nursing were personal qualities, intellectual skills and abilities, and patient care capabilities. The Ryerson graduate was described as being enthusiastic, flexible, able to think things through, articulate, competent, responsible and interested in her patients.

These same directors of nursing, however, also felt that the young Ryerson graduate had certain problems. To one, she seemed to lack confidence and to another, she did too much on her own. In the view of nearly half of the directors, she had insufficient practical experience. Further, three of them felt that she required help and support and one that she was disorganized initially. It might be remembered, however, that despite these difficulties, the orientation had not been modified for the young graduate, extra help had not been provided, yet her performance was judged satisfactory by the directors of nursing.

The picture of the Ryerson graduate which emerges from interviews with the head nurses[9] is similar. They commented frequently on her ability to think things through and to make decisions (43%), on her willingness to learn and to accept criticism (31%), and on her grasp of principles (31%). The head nurses strongly emphasized her articulateness and willingness to discuss things with her superiors and to use them as resource people. Further, while some of the head nurses (12%) saw her as independent and flexible, others (19%) felt that she also participated and cooperated in the ward work. The head nurses did not fail to mention the relationship between the Ryerson graduate and her patients. She was interested in her patients (31%) and was able to give them emotional support.

The difficulties of Ryerson graduates, identified by head nurses, are also similar to those emerging from the reports of directors of nursing. Some of the head nurses (19%) made comments regarding the lack of confidence of the young graduate, and others reported a slowness to identify with nursing (12%). But the majority of head nurses were concerned with problems in the giving of nursing care. They stated (12%) that she needed more initial help; (12%) that she was slower in taking a full load; and (12%) that she lacked organization. More outstandingly the head nurses (31%) felt that she needed help, particularly in dealing with doctors and in directing other staff.[10] However, in contrast, with the reports of the directors of nursing (46%), none of the head nurses identified "not enough practical experience" as a particular problem of the young Ryerson graduate.

How then do the young Ryerson graduates see themselves? As might be expected, the pattern does not differ greatly from the view of head nurses or of the employers. In describing herself, the Ryerson graduate places greater emphasis on personal and intellectual qualities such as independence and flexibility (47%), the ability to think things through and make decisions (34%) and a broad background and knowing the reason why rather than specific procedures (18%). In talking of strengths, these young graduates do not neglect their nursing skills, with many (30%) emphasizing the Ryerson graduate's ability to provide emotional support for the patient, and others (9%) her ability to participate and work with others, or (13%) her interest in change and new ways. As was mentioned by both the directors of nursing and the head nurses, the graduates themselves saw that the Ryerson graduate was able to relate to supervisory staff in a far different way than other young graduates. She accepts criticism, is willing to learn and sees the supervisory staff member as someone to whom to go for help, not as someone to fear.

While the Ryerson graduate readily identified many of her strengths, she was not blind to her difficulties. She suffers from lack of self-confidence (according to 22% of the graduates). On the other hand, she goes too far on her own (said 9%). The two problem areas, identified most often by the graduates were "needs help in taking charge" (26%) and "is slower in doing procedures initially but soon catches up" (30%). The former problem was mentioned also by the head nurses but the latter difficulty was reported only by the graduates themselves. However, some (9%) agreed with the head nurses that the Ryerson graduate was both slower in taking a full load and in developing a feeling of being a nurse. One stated that she felt that she had to prove herself and another agreed with the directors of nursing that she had not enough practical experience.

What then are the outstanding strengths and difficulties of the young Ryerson graduate? All three groups of respondents strongly agree that she has the ability to think things through and is willing to learn. The graduates themselves and the directors of nursing see her as independent, flexible and adaptive. The directors of nursing go on to mention that she is articulate, competent and able to accept responsibility. The head nurses remark on her respect for self and patient, and her interest in patients. The graduates, along with the head nurses, point to her broad background and ability to use principles. The graduates themselves are proud of their ability to give emotional support.[12]

While several of the same problems were identified by all three groups of respondents, the emphasis varied from group to group. The

TABLE 64

THE RYERSON GRADUATE IN THE "WORK WORLD"

DISTRIBUTION OF OPINIONS OF RYERSON GRADUATES, HEAD NURSES AND DIRECTORS OF NURSING OF THE STRENGTHS AND DIFFICULTIES OF THE RYERSON GRADUATES, 1968-69

Strengths	Ryerson Graduates N=23		Head Nurses N=16		Directors of Nursing N=13	
	N	%	N	%	N	%
1. Independent, flexible, adaptive, poised.	11	47	2	12	8	62
2. Ability to think things through, make decisions, know own limits.	8	34	7	43	5	39
3. Has broad background and has learned to make use of basic principles and knows reason why instead of procedures.	4	17	5	31	—	—
4. Articulate, speaks up for self, has suggestions for patients.	—	—	2	12	7	54
5. Willing to learn, accepts criticism, uses supervisory staff for reference.	6	26	5	31	4	31
6. Participates in ward and works with others.	2	9	3	19	—	—
7. Respects self and patients.	—	—	6	37	—	—
8. Cares about and is interested in patients.	—	—	5	31	1	8
9. Able to give good emotional support to patients	7	30	1	6	—	—
10. Is able to teach patients.	—	—	—	—	1	8
11. Is competent and able to accept responsibility.	—	—	—	—	5	39
12. Likes change and new ways.	3	13	—	—	—	—

Difficulties	Ryerson Graduates N=23		Head Nurses N=16		Directors* of Nursing N=13	
	N	%	N	%	N	%
1. Lacks confidence in self.	5	22	3	19	1	8
2. Goes too much on own, Over-confident.	2	9	—	—	1	8
3. Slower in procedures initially, quickly catches up.	7	30	—	—	—	—
4. Needs more initial help and support.	—	—	2	12	3	23
5. Needs help in taking charge, dealing with other staff, doctors, etc.	6	26	5	31	—	—
6. Not able to keep up on busy ward, slower in taking full load.	2	9	2	12	—	—
7. Has to prove self.	1	4	—	—	—	—
8. Lacks organization initially.	—	—	2	12	1	8
9. Slower to develop feeling of being a "nurse".	2	9	2	12	—	—
10. Lacks neatness.	—	—	1	6	—	—
11. Not enough practical experience.	1	4	—	—	6	46

* Three directors of nursing(23%) stated during the interview that they did not know enough about the Ryerson graduate at their institution to give such answers.

directors of nursing felt particularly that the young Ryerson graduate needed more initial help and support and had not had enough practical experience. While some of the head nurses agreed with the former, none identified the latter as a weakness. Rather, they frequently mentioned problems that arose in the ward situation, such as the young graduate's lacking confidence in self and needing help in taking charge.[13] The Ryerson graduates themselves agree that both of these difficulties arise, and add that they are slower in completing procedures initially, but quickly catch up.

Since these graduates are from a new program, differing from the more traditional hospital program, their performance is silhouetted against the background of the average young hospital graduate's abilities and performance. (Table 65) With this assumption in mind, the respondents were asked: *How does the Ryerson graduate compare with the average young hospital graduate?* The responses of the directors of nursing offered contrast within themselves. On the one hand, five employers saw the young Ryerson graduate as lacking confidence as compared to the average young hospital graduate, but as performing well despite this lack of confidence. Three felt that she was more willing to take initial responsibility for herself while the hospital graduate looked more to those in charge, and four emphasized that she was better able to speak for herself and to discuss her work with the head nurses and supervisors. On the other hand, four directors of nursing stated that the hospital graduate has more experience and so is more efficient. However, three of the directors of nursing felt that they "were not in a position" to make such a comparison and did not compare the two groups.

While all of the head nurses were willing to discuss the differences, their responses were varied. Two felt that the Ryerson graduate is less confident but willing to learn, while the hospital graduate is more sure of herself. Three of them (18%) agreed with the directors of nursing that the Ryerson graduate is better able to speak for herself, but only one of them seems to feel that a hospital graduate is more efficient. Further, about a quarter of them felt that while the hospital graduate knows procedures well, she is not as flexible and, as one head nurse stated, "she often has to unlearn." The Ryerson graduate, it would seem, realizes that there is more than one way to "do something". However, one head nurse felt that while the hospital graduate does "domestic chores" as part of their duties, the Ryerson graduate tries to avoid them.

In comparing themselves with hospital graduates, the Ryerson graduates agree that they are better able to speak for themselves,

to say what they think is best and to participate in conversation with supervisors. They stated that the Ryerson graduate, as compared with the average hospital graduate, is not tired of being "dumped on by supervisors" and sees supervisors as being helpful. They (34%) also claimed that the Ryerson graduate likes nursing and patients better, and that she is much more interested in remaining in nursing. Four (17%) felt she has had a better psychiatric orientation and so is better able to give emotional support to her patients. Some (36%) explained their ability to adapt by the fact that the hospital graduates did not work in as many hospitals as the Ryerson graduate who had the advantage of seeing things done in many different ways. They (22%) confessed, however, that the Ryerson graduate is less confident of herself than is the hospital graduate.

In an attempt to collect concrete examples of the behaviors which would complete the descriptive picture of the Ryerson graduate, both head nurses and the graduates were asked : *What stands out most in your memory during the first month of employment?* The first impressions of the young Ryerson graduate complement the reports made of strengths and problems. More than half of the comments made by the head nurse related to personal characteristics; for example, that which stands out most in the head nurses' memories (56%) was the lack of confidence the graduates had in themselves. However, many (31%) of the head nurses qualified this report with praise such as : "They were timid and lacked confidence but really worked hard and tried". Fairly strong in the head nurses' memories was the young graduates' willingness (37%), flexibility (19%) and interest (19%). While they had little to say about her relationships with others, the head nurses (19%) did feel that the graduates fit quickly into the ward situation. In one case, this report was qualified by the observation that before she was accepted, the young graduate was tested on several occasions by the other nurses.

The "first impressions" of half of the head nurses related to the Ryerson graduate's performance; of these, six retained favorable memories, two unfavorable. Four head nurses mentioned that the young graduate quickly and ably accepted responsibility for herself and for her patients; one felt that she was able to manage in an emergency and another that she was satisfied giving care at the bedside. The two unfavorable comments about the Ryerson graduate's initial performance were, first, that she was not available for dirty work, and second, that she did not know what to do or where things were.

The first impressions of the Ryerson graduates are somewhat

TABLE 65

THE RYERSON GRADUATE IN THE "WORK WORLD" DISTRIBUTION OF OPINIONS OF THE RYERSON GRADUATES, HEAD NURSES AND DIRECTORS OF NURSING, OF HOW RYERSON GRADUATES COMPARE WITH GRADUATES OF HOSPITAL SCHOOLS OF NURSING, 1968-69

Ryerson Graduates Compared with Hospital Graduates	Comparisons made by : Ryerson Graduates N=23		Head Nurses N=16		Directors of Nursing* N=13	
	N	%	N	%	N	%
Ryerson graduates like nursing and patients better, do not want to leave nursing, hospital graduates have had to work too hard.	8	34	—	—	—	—
Ryerson graduates better able to speak for self, respond to supervisors as reference people while hospital graduates seem to be afraid of their supervisors.	10	43	3	19	4	31
Ryerson graduates, greater psychiatric orientation, able to give better emotional support.	4	17	—	—	—	—
Ryerson graduates realize there is more than "one way", hospital graduates know procedures better but Ryerson graduates are more adaptive.	7	30	4	25	—	—
Ryerson graduates less self-confident but willing to learn and adjust more quickly; hospital graduates seem more sure of selves.	5	22	2	12	5	39
Ryerson graduates more willing to take initial responsibility for self, hospital graduates look more to those in charge.	—	—	1	6	3	23
Ryerson graduates need more initial help, hospital graduates better able to organize on own.	—	—	2	12	—	—
Ryerson graduates less efficient, hospital graduates able to cut corners when busy.	—	—	1	6	4	31
Ryerson graduates try to avoid domestic chores, hospital graduates do them more as part of duties.	—	—	1	6	—	—

* Three directors of nursing felt they were not able to make such a comparison.

similar to those of the head nurses. However, an even higher per cent (86%) confess that they were scared, lacked confidence or were apprehensive. One graduate did feel that this lack of confidence made her grow up more quickly; another, that despite the feeling, she was pleased to be a graduate. The memories of the graduates, in contrast with those of the head nurses, were of relationships with others rather than of performance on the ward. While many graduates (34%) remembered coping and being able to do procedures, others (22%) did not know what to do or where things were. Four of the five qualified the latter memory with the observation that their experience in different hospitals helped them overcome this difficulty.

Most of the memories of relationships with others were concerned with the question of *fit* into the word situation. Nine of the eleven graduates who remembered "fitting in" quickly were initially surprised that they did. One graduate felt that she did not know what was expected of her, two that the staff was helpful and pleasant, and another two remembered feeling pleased at the peer relationship they were able to develop with the nursing staff.

On the whole then, neither head nurse nor graduate retained extremely unpleasant memories of the Ryerson graduate's first month on the ward. However, one of the more oustanding memories on the part of both was the graduate's lack of confidence. These first impressions complement the composite picture of the Ryerson graduate drawn by the directors of nursing, head nurses and the young graduates themselves. It might be noted, however, despite problem areas mentioned earlier, such as lack of experience, the first impressions of neither the young graduates themselves nor the head nurses include the need to give or to receive extra help.

Part III — *Performance and Relationships with the Work World*

The concept of *fit* refers to the individual's adaptibility and readiness for appropriate action in a way that meets the demands and expectations of others in a social situation.

The problem of *fit* in a way bifurcates: there is the ifndividual and the setting or situation into which he *fits*. The question was asked: *Does the Ryerson graduate fit into the work world?*[14] To answer the question, information was collected on both the Ryerson graduate's view of the ward and on how her performance is viewed within the ward setting. The young graduates were first asked to evaluate the level of nursing care on their ward.[15] Most (77%) of the responses were favorable, even enthusiastic: they made com-

TABLE 66

THE RYERSON GRADUATE IN THE "WORK WORLD"
DISTRIBUTION OF OUTSTANDING MEMORIES OF RYERSON GRADUATES AND HEAD NURSES OF THE FIRST MONTH THE RYERSON GRADUATE WORKED ON THE UNIT, 1968-69

Outstanding Memories	Respondents Having Memory			
	Ryerson Graduates N=23		Head Nurses N=16	
	N	%	N	%
I About the Ryerson Graduate Personally:				
a) Scared, lacked confidence, apprehensive.	20	86	9	56
b) Ability to ask questions, to say when did not know, willing to learn	—	—	6	37
c) Flexible, adaptive.	—	—	3	19
d) Keen, interested, liked being a graduate.	2	9	3	19
II About the Performance of the Ryerson Graduate:				
a) Able to cope with both routine and emergencies.	8	34	1	6
b) Accepted responsibility for self and patient.	—	—	4	25
c) Was peased to give bedside care.	—	—	1	6
d) Not available for dirty work.	—	—	1	6
e) Often did not know what to do, where things were.	5	22	1	6
III About the Ryerson Graduate's Relationships with Others:				
a) Fit in quickly (graduates themselves surprised), remainder of staff seemed satisfied.	11	47	3	19
b) Pleased to be on one's own ("no looking over shoulder").	2	9	—	—
c) Staff helpful and pleasant.	2	9	—	—
d) Not enough help or orientation, did not know what was expected of them.	1	4	—	—

ments such as "the staff is good", "it's busy but they maintain standards", "can maintain own standards there", "good care is expected so we do it", or "the care is individualized" (Table 67). Three of the graduates qualified their statements with : "you had to organize to do the important things because the ward was very busy" or "there is not enough staff in the evenings and on nights"; and two offered unfavorable comments such as: "there are not enough conferences held on the ward", "there is poor organization on the ward" and "there is too heavy a load". On the whole, these young graduates seemed to feel that the level of care was good and that the staff was trying hard to maintain standards and that they themselves were encouraged to give care as they were taught to give it.

The young graduate looked at the ward unit in a favorable light, and as a place in which she would like to function. *How do the rest of the staff look at her, her work and her preparation?* [16] (Table 68) Most of the head nurses (87%) felt that the nursing staff saw these young graduates as functioning adequately if not excellently. One head nurse qualified this evaluation stating that the

TABLE 67

THE RYERSON GRADUATE IN THE "WORK WORLD" RYERSON GRADUATES' EVALUATION OF NURSING CARE ON THEIR WARD, BY PER CENT AND NUMBER OF OPINIONS, 1968-69

Opinion of Nursing Care on Ward	N=23 Holding Opinion Ryerson Graduates	
	N	%
I Favorable Good equipment and staff; busy but they maintain standards; good care expected; care individualized; can maintain own standards.	18	77
II Qualified Have to organize to do important things; staff try but not enough of them, etc.	3	13
III Unfavorable Poor organization on ward, do not have enough conferences; too heavy load.	2	9

graduate needed some initial help from the rest of the staff, and two felt that the young graduates were accepted only after a trial

run. The two remaining head nurses felt that initially there had been a fair amount of criticism of the young graduate's work but that the work improved after a short time. [17]

Further, most (74%) of the staff knew little about the nursing program at Ryerson, few realized that it differed from the more usual hospital preparation. However, while 12 per cent did feel that Ryerson was a very good school, another 12 per cent did not think much of a two-year program such as Ryerson — they preferred hospital programs.

How is her performance viewed by the remainder of the staff according to the Ryerson graduate herself ? While three of the graduates felt that the staff thought their preparation at Ryerson good, nearly three-quarters of them were not quite sure that the staff knew very much about their program. Further, 94 per cent of the Ryerson graduates believed that their work was accepted and only one felt that the staff were highly critical of her work. [18]

These young graduates on the one hand are pleased with the ward situation, and on the other, are regarded by the ward staff in a favorable light. However, does their process of socialization allow them to *fit* easily into the social work group? (Table 68, Part II) Most head nurses (69%) stated that the Ryerson graduate "fit" easily and quickly, "they pitched in", "they became part of the group", "they had no problems", "no troubles". They were accepted and began to function as part of the ward group almost immediately. However, three felt that the group acceptance came only after some initial difficulty.[19] Only two of the head nurses felt that the young graduate had a hard time fitting in or that she did not *fit* in at all.

The young graduates themselves view this process of acceptance in much the same light as do the head nurses. Most (85%) stated that they fitted in readily. Two of the graduates were "not quite sure", and one felt that she had not become part of the ward group.[20] It would appear, then, from the point of view of both the head nurse and of the graduates themselves, that, the young graduates began to function as a member of the ward staff quickly and without unusual difficulty.

As a further index of satisfaction, Ryerson graduates were also *asked how they felt about their assignments and rotations.* Over half of them reported that the assignments or rotations were good and made no further comments about them. Seven saw them as fair,

TABLE 68

THE RYERSON GRADUATE IN THE "WORK WORLD" DISTRIBUTIONS OF OPINIONS OF RYERSON GRADUATES AND HEAD NURSES ON HOW THE WARD STAFF LOOK AT WORK AND PREPARTION OF RYERSON GRADUATES AND HOW THE RYERSON GRADUATE *FITS* INTO THE WARD, 1968-69

	In Opinion of Ryerson Graduates N=23		Head Nurses N=16	
I Attitude of Rest of Staff	N	%	N	%
a) Toward preparation:				
1) Thought Ryerson good.	3	13	2	12
2) Seem to know little about program at Ryerson.	17	73	12	74
3) Did not approve of Ryerson or preferred other programs.	3	13	2	12
b) Toward work on ward:				
1) Does work well or accepts work.	22	95	14	87
2) Critical of work, resent attitude of Ryerson graduate.	1	4	2	12
II How Ryerson Graduates Seem to *Fit* Into Ward Setting:				
a) *Fit in* quickly, became part of group.	20	86	11	68
b) *Fit in* after some initial difficulty.	—	0	3	19
c) Did not seem to *fit* — seemed in feel left out.	1	4	2	12
d) Don't know.	2	9	—	0

with the greatest problems being excessive shift work or night work, or insufficient staff on shift and nights. Only one graduate complained of both rotations and assignments. [21]

In proving the relationships between preparation and fit in the work world, the graduates were asked *if their program had prepared them for what was expected of them.* (Table 69) Eighty-two per cent of the graduates replied "yes", without any qualifications, two were undecided, [22] and two felt it had not. Their comments could be summarized as follows: They felt they had broad backgrounds and varied experience which helped them adapt to various situa-

tions. They knew how to take responsibility and could "think things through" which made up for the difficulty of "not having done things before".[23] They had learned early, and continued to know, where to go for help, when to ask questions, and what questions to

TABLE 69

THE RYERSON GRADUATE IN THE "WORK WORLD"
DISTRIBUTION OF THE EXPECTATIONS
MADE OF, AND HELD BY THE RYERSON
GRADUATE IN THE WORK SITUATION, 1968-69

	Graduates Holding Opinions N=23	
	N	%
I Did program at Ryerson prepare you for what was expected of you on ward ?		
a) Yes (Comments: Did not know all procedures but could adjust; had broad background and varied experience, knew how to take responsibility, to think things through, where to go for help or ask questions.)	19	82
b) I don't know	2	9
c) No	2	9
II Were your expectations met on becoming a graduate ?		
a) Yes (Comments : Feel can do work, like experience, is giving challenge, is developing more skill, able to set own limits, etc.)	19	82
b) Somewhat (Comments: Occasionally feels left out, often frustrated, care on ward does not seem to improve, etc.)	2	9
c) No (Comment : Don't feel like a dedicated nurse, was passed by in promotion by hospital graduate with less experience.)	2	9

ask. They believed they could meet expectations set for the young graduate giving bedside care. They liked beside care and they were able to give it.

While these graduates felt that they met the expectations of others, *were their expectations as young graduates met ?* Were they satis-

fied with what they were doing, and how they were able to do it ? The same 82 per cent of these young graduates who felt that they were prepared to meet the expectations of others, reported that their own expectations as a beginning graduate were met. They could do the work; they liked the experiences they were having, many of which were more varied or had more responsibility than those experiences they had had as students.[24] They looked forward to challenge and to developing their nursing skills. They liked being left to themselves to make decisions and to carry out care. They were allowed to set their own limits and many of them were being encouraged to continue their development as nurses.

There were, however, two graduates who felt somewhat disappointed. It seemed that they occasionally felt left out, frustrated by non-improvement of nursing care, and that they were more ready and eager for change than hospitals and staff were willing to undertake.[25] Two felt that their expectations had not been met. One did not "feel like a dedicated nurse" and was especially disappointed with life as a graduate.[26] The second young graduate had no real complaint about the work she was doing or the expectation of direct bedside nursing care. She was bitter, however, in that she felt that she had been "passed by" by the head nurse for promotion.[27]

Since the head nurses worked with and supervised the Ryerson graduates on a day-to-day basis, they were asked to contribute even further to this compilation of data concerning her functioning in the work world. An instrument, in the form of an opinion scale,[28] was designed to measure one particular aspect of nursing: *Responsibility* :[29] the head nurses' judgments of the behavior of the Ryerson graduate and the average hospital graduate.

Responsibility was selected as only one of the important aspects of nursing. The concept of "Responsibility" is essential to the definition of any profession. The practice of "Responsibility" is essential to performance of any profession. The nurse, as a member of a profession, is responsible for herself, for her patient and for her profession. The teachers of nursing feel that teaching responsibility is a major part of their teaching role. The head nurses, under whose supervision students practise nursing, believe that the students must learn and practise responsibility in giving care to patients.

The instrument, to assess "Responsibility", was composed of a series of items (behavioral examples) grouped into a matrix composed of the two categories (1) "accountable to" and (2) "accountable for" and their sub-categories, "focus on self nursing a patient" and "focus on the team, unit or institution".[30]

CHART 4

THE RYERSON GRADUATE IN THE WORK WORLD
MATRIX OF DIMENSIONS OF
RESPONSIBILITY SCALE
(with sample items)

	"Accountable for" (Rational approach to problem solving)	"Accountable to" (Subject to direction and authority)
Focus on Self, Nursing a Patient	A Item : Observes and gathers relevant information on which she bases her assessment of patient needs.	B Item: Is efficient and skilled in the performance of nursing procedures and techniques.
Focus on Team, Unit or Institution	C Iteem: Provides helpful ideas and suggestions about the care of patients on the ward.	D Item: Pays attention to the policies and procedures of the institution.

The head nurses were asked to evaluate the young Ryerson graduate and the average young graduate on each of the items of the "Responsibility" instrument. The mean composite scores of head nurses' evaluation of Ryerson graduates and the average hospital graduate are given in Table 70.

TABLE 70

THE RYERSON GRADUATE IN THE "WORK WORLD"
THE RESPONSIBILITY SCALE
EVALUATION OF RYERSON GRADUATES AND
HOSPITAL GRADUATES BY HEAD NURSES
MEAN COMPOSITE SCORES OF RYERSON GRADUATES
AND OTHER NEW GRADUATES OF
DIPLOMA PROGRAMS, 1968-69

Dimension	Mean* Composite Score Ryerson Graduates	Diploma Graduates
A	2.57	2.36
B	2.3	2.41
C	2.49	2.24
D	2.44	2.61
TOTAL	9.80	9.62

*There is no significant difference in means.

While there is no significant difference between the means of these composite scores on any of the dimensions, the Ryerson graduates are rated highest (2.57) on Dimension A, the rational approach to problem-solving with "focus on self, nursing a patient." Their next highest score falls in Dimension C, rational approach to problem-solving with "focus on team, unit or institution." The hospital gradutes are rated highest on Dimension D, subjet to direction and authority or "accountable to" with "focus on the team, unit or institution", and next highest, but still higher than the Ryerson graduates, on Dimension B, subject to direction and authority with emphasis on "self, nursing a patient." The young Ryerson graduate is rated highest on the rational approach to problem-solving; the young hospital graduate, highest on being subject to direction and authority. On looking at the matrix vertically the young Ryerson graduate is rated highest on "self, nursing a patient," while the young hospital graduate is rated highest on her "focus on the team, unit or institution."

Table 71 shows the difference in mean composite score, for each item, between the Ryerson graduate and the average hospital graduate. The range of difference is from plus 8 (i.e. the mean Ryerson score is 8 points higher than the mean score for the hospital graduate) through zero (i.e there is no difference between the two) to minus eight (i.e the mean Ryerson score is 8 points less than that of the average hospital graduate).

DIAGRAM 4

THE RYERSON GRADUATE IN THE "WORK WORLD"
THE RESPONSIBILITY SCALE
DIAGRAM OF AMOUNT OF DIFFERENCE BETWEEN
THE SCORES OF RYERSON GRADUATES
AND HOSPITAL SCHOOL GRADUATES,
ON INDIVIDUAL ITEMS AS ASSIGNED
BY HEAD NURSES, 1968-69

Number of Points of Difference in Score Between Ryerson and Hospital School Graduates	0	1	2	3	4	5	6	7	8	Mid-range Level / .75 range Level (Range of Difference: 0-8)
Numbers of Items Showing Difference	3	5	2	5	1	2	0	1	3	(Total Number of Items : 22)

TABLE 71

THE RYERSON GRADUATE IN THE "WORK WORLD"
THE RESPONSIBILITY SCALE
DIFFERENCES IN COMPOSITE SCORES BETWEEN
RYERSON AND HOSPITAL GRADUATES ON
INDIVIDUAL ITEMS, 1968-69

Item	Difference In Score	Item	Difference In Score
Dimension A		Dimension B	
1	4+	6	2—
3	2+	10	3—
5	3+	13	1—
8	0	16	1+
12	8+	22	3—
Dimension C		Dimension D	
7	8+	2	5—
11	1+	4	8—
15	7+	9	1+
18	0	14	3—
21	5+	17	1—
		19	0
		20	3—

+ means Ryerson evaluation higher than diploma graduates.
— means Ryerson evaluation lower than diploma graduates.

In ranking these differences of zero to eight (i.e. from plus 8 points through zero to minus 8 points) and ignoring the plus and minus signs, fifteen of the twenty-two items fall below the mid-range level (i.e. a difference of less than 4 points). Eighteen of these items are below the .75 range level with a difference of less than six points. Only four items show more than 6 points difference between the two groups. The greater the difference the greater the discriminating power of the item.

Restated then, eight items on which the mean scores were the same or varied by only one point failed to differentiate between the two groups. These items, from all four dimensions, are as follows:

Dimension

A 8. Uses knowledge appropriately in coming to nursing decisions.

B 13. Follows nursing routines related to easy ambulation of patients, preparation for discharge, specific teaching plans, etc.

16. Shows initiative in nursing care for patients.

C 11. Tries to learn more about nursing and related fields.

18. Provides helpful ideas and suggestions about the care of patients in the ward.

D 9. Accepts criticism well and respects the head nurse and supervisors.

17. Pays attention to the policies and procedures of the institution.

19. Readily accepts the working conditions of institutions, hours of work, days off, etc.

The items which actually differentiate (i.e. have a difference in composite score of more than 4 points) are found within Dimensions A, C and D. However, of the four items showing differentiation of six points or more (i.e. above. 75 range level), one is from Dimension A : *She continues each day to know more about her patients as a basis for predicting their needs.* Two are from Dimension C: *She recognizes the reality of the nursing situation in the ward and plans from there,* and : *She is able to assume leadership in undefined situations which require nursing action.* (Dimensions A and C are from the "accountable for" column of the matrix.) The Ryerson graduate was rated distinctly higher than the average young hospital graduate on each of these three items. These findings lend support to the pattern which emerged from the interviews, that the Ryerson graduate thinks things through, plans and is able to reach nursing decisions.

The remaining item, which differentiated between the two groups, but on which the hospital graduate is ranked higher than the Ryerson graduate, is from Dimension D, and the "accountable to" column of the matrix: *She presents a well-organized and self-assured appearance to patients and co-workers.* This finding complements the interview data which indicate that the young Ryerson graduate is neither as well-organized or as confident as the young hospital graduate.

The Ryerson graduate is rated higher on two of the three items falling between the midpoint and the .75 level. These are from Dimension A: *She observes and gathers relevant information on which she bases her assessment of patient needs,* and Dimension C: *She takes part willingly in change related to the improvement of nursing*

care. On the other hand, the hospital graduate is rated higher on the remaining item from Dimension D which differentiates fairly well. It is: *She pitches in to get work done on the ward.*

While one group is not shown to be significantly more responsible than the other, this "Responsibility" instrument does discriminate between the two groups in terms of specific aspects of responsibility. In answer to the criticism that graduates from programs such as Ryerson may not learn responsibility, these findings seem to indicate that not only are they, in the opinion of their head nurses, as responsible as the average young hospital graduate (Table 70 Ryerson total score 8.80; average hospital graduate 9.62), but on one particular form of responsibility they are distinctly stronger (i.e "accountable for"). Programs in an educational setting and programs in the hospital setting vary in orientation and approach. Both groups, hospital graduates and Ryerson graduates, are responsible nurses: the Ryerson graduates scoring higher on the rational approach to problem-solving (i.e "accountable for"); the hospital graduates in the realm of being subject to direction and authority (i.e. "accountable to").

Part IV — *Type of Program Preferred for the Preparation of Nurses*

A final question was asked to each of the three groups of respondents. *Which type of nursing preparation would you prefer: a program such as Ryerson or a hospital school of nursing?* A summary of the results is to be found in Table 72.

TABLE 72
THE RYERSON GRADUATE IN THE "WORK WORLD"
TYPE OF NURSING PREPARATION PREFERRED BY
RYERSON GRADUATES, HEAD NURSES AND
DIRECTORS OF NURSING, 1968-69

	Strength of Feeling											
	Strong						Not Too Strong					
Preparation Preferred	Ryerson Graduates		Head Nurses		Directors of Nursing		Ryerson Graduates		Head Nurses		Directors of Nursing	
	N	%	N	%	N	%	N	%	N	%	N	%
Favor Ryerson over hospital schools	22	95	6	37	1	8	1	4	3	19	1	8
Favor hospital schools over Ryerson	—	—	4	25	2	16	—	—	3	19	9	69

N: Graduates — 23; Head Nurses — 16; Directors of Nursing — 13.

The graduates themselves prefer Ryerson unanimously (95% strongly, 5% not too strongly). Nearly 60 per cent of the head nurses

(six of them strongly, three of them not too strongly) also prefer Ryerson after having worked with the Ryerson graduates. Another three are not too strong in their preference for hospital preparation; but (25%) of them feel strongly about their preference for hospital programs. It is the directors of nursing who are less sure of their feelings; nearly 80 per cent place their responses in the "not too strong" category (only one favors Ryerson while nine favor hospital schools). Of those directors who have fairly well-formed opinions, one favors Ryerson while two look to the hospital schools.

It would seem then that those respondents who knew the Ryerson program best, the graduates themselves, favored it most highly. Ranking next, in terms of their favorable attitude toward nursing preparation at Ryerson are the head nurses, who have had experience with the product of this program, the graduates. Those who have been associated with the program or its graduates less directly tend to have weaker opinions toward all types of preparation, but still favor the program with which they are most familiar, the hospital school.

What are the views of the three groups on the Ryerson nursing program? A summary of their comments follows:

1. *Summary of Comments by the Directors of Nursing*

Many strengths were attributed to the Ryerson graduates by directors of nursing, but few, if any, to the program that prepared them. Half the directors claimed that they could only judge the graduates on their personal merits and half admitted that they did not know enough, or needed to know more, about the program. Yet, in conclusion 85 per cent stated that they preferred hospital preparation for nurses. Opinions were frequently stated in terms of two-year programs in general rather than Ryerson in particular. The prevailing judgment of the directors was that these young graduates had not had enough practice. Despite such an opinion, none of the directors of nursing planned or carried out any modifications in the orientation program, for the purpose of augmenting the program the graduates had just completed at Ryerson. While all of the directors felt that graduates from such a program were prepared for work on a "general ward", most of the graduates were assigned to wards on the basis of staffing requirements with over half of the placements being in a specialty area.

While the performance of graduates from the Ryerson program was generally judged to be good, the valued characteristics were seen as personality traits and individual abilities. There was no suggestion that the program might have fostered these characteristics. Forty per cent of the directors of nursing stated that the products of all two-year

programs like Ryerson required extra help or support; or should be given a one-year internship (20%); or that there should be a separate category of staff nurses from this type of program because their level of performance was not as high as the hospital schools of nursing (10%). There would appear to be some contradiction in the opinions held by directors of nursing. When questioned about the graduates from the nursing program at Ryerson whom they employ, the directors of nursing stated that they are pleased with the graduates' performance, that they made no change in orientation or assignment, and that they know little about the Ryerson program. However, many also stated that the graduates from "such programs" have not had enough practice, cannot "keep up" with the rest of the staff, and need more intensive help, direction and orientation. It would seem, however, that the graduates perform adequately without such help.

2. *Summary of Contents by the Head Nurses*

The head nurses on the whole felt that few, if any, of their staff knew or realized that these graduates graduated from a different type of program. The program was seen simply as one of many that prepare nurses to do nursing. More than half of the head nurses favored Ryerson over the traditional hospital programs. They viewed the program as preparing nurses who may initially need extra support and who are somewhat weaker in administrative abilties, but who fit well into the ward picture. They feel that they more than make up for any such problems in that they are flexible, they ask questions, and they readily seek help and take criticism seriously. They feel that these graduates are responsible, particularly in being accountable for their decisions and actions. They respect both themselves and their patients.

The head nurses are favorably impressed by these graduates, and, while they agree with directors of nursing on the strengths the graduates possess, they are willing to attribute to the school some influence in the development of these qualities. The head nurses, of course, are directly exposed to and work with the Ryerson graduates. Some of the head nurses have never before known graduates of two-year programs and they remark on their ability, their willingness and the care which they give their patients. They feel that while these graduates suffer particularly from lack of confidence, they are still able to cope with both routine and emergency situations.

3. *Summary of Comments of the Ryerson Graduates Themselves*

The graduates saw the program as contributing to their development as nurses. They liked their program, believed that it was relevant, and that they were prepared for the work world. They viewed

themselves as initially a little slower than hospital graduates, but able to catch up easily because of their broad background and flexibility. They reported that the program helped them to become articulate and prepared them to think things through for themselves. They unanimously preferred the program at Ryerson to the hospital-based nursing programs.

Part V — *Nursing Approach Scale*

Nursing literature, at least tacitly presents descriptions of "today's" nurses in terms of comparison and contrast with the "more traditional" nurse. The *Nursing Approach Scale*[31] based on this dichotomy of "traditional" and "modern" orientations, was administered to the Ryerson graduates and to three other graduates from the ward on which they worked. The purpose was to compare and contrast the "values picture" of the young Ryerson graduate with that of the nursing staff. *Were the Ryerson graduates, educated in a new program in an educational setting, more "Modern" or more "Traditional" in approach than the average hospital graduate?*

Of the qualities or characteristics of each "type" of nurse found in the literature, eight pairs were retained after validation, as the basic dimensions of the Nursing Approach Scale (Table 73). Each dimension was represented by one or more items, for a total eighteen

TABLE 73
NURSING APPROACH SCALE
SCORES BY DIMENSION FOR YOUNG RYERSON GRADUATES AND OTHER HOSPITAL-TRAINED GRADUATES WORKING ON THE SAME WARD, 1968-69

Dimensions Traditional-Modern	No. of Items in Dimension	Scores by Dimension: Ryerson Graduates N=17	Scores by Dimension: Other Graduates From the Same Ward N=41
A. Attentive-Responsive	2	6‡	3.6*
B. Confident-Analytic	1	2.6	3.0
C. Well-organized-Flexible	2	5.2	5.2
D. Well-trained-Innovational	2	6.4‡	5.4
E. Protective-Permissive	3	10.2 ‡	8.4
F. Dependable-Accountable	4	10.8	10.4
G. Efficient-Imaginative	2	6.8‡	6.0‡
H. Intuitive-Perceptive	2	6.4‡	5.6
CUMULATIVE MEAN		54.2@	47.6

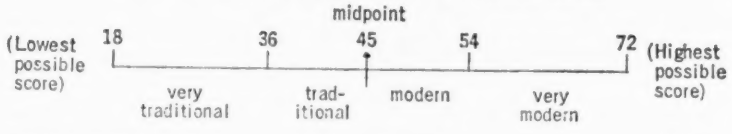
* Scores falling within "traditional" interval of scale.
‡ Scores falling at bottom or above bottom limits of "very modern" interval of scale.
@ Significant difference between Ryerson graduates and other hospital graduates.

items. Each item was in the form of a nursing situation which allowed two alternate courses of action — one representing the "Traditional" approach, the other the "Modern" approach. The respondents indicated which course of action they felt the nurse *should* follow.

The Ryerson graduates' cumulative mean score (54.2) on the *Nursing Approach Scale* is significantly higher than that of the ohter graduates (47.6) working on the same wards (Table 73). However, in interpreting the scores as being "modern" or "traditional" in approach to nursing, both mean cumulative scores fall above the midline of the "modern-traditional" scale. The Ryerson graduates' score is found in the "very modern" interval, that of the other graduates in the "modern" interval.

DIAGRAM 2

INTERPRETATION OF NURSING APPROACH SCALE



		Interval	*Scores*
Highest possible score:	72		
Midpoint:	45	Very traditional:	18-35
Lowest possible score:	18	Traditional-modern:	36-53
		Traditional:	36-44
		Modern:	45-53
		Very modern:	54-72

The dimensions which together form the "traditional-modern" scale and the mean scores of both the Ryerson and the other graduates are found on Table 73. The Ryerson graduates' scores tend to be higher on all dimensions except that of the "confident-analytic" dimension, where she sees being "confident" as preferable to being "analytic". One might ask if the lack of inner self-confidence expressed by the Ryerson graduate leads her to the view that the "ideal" nurse should be "confident" in her approach to nursing.

Both groups, the Ryerson graduates and other graduates from the same wards fall at or above the bottom limit of the "Very Modern" interval on Dimension G, preferring to be more imaginative than efficient. The Ryerson graduates' responses also fall in the "Very Modern" interval for Dimensions A, D, E and H, indicating that they believe the nurse should be responsive (rather than attentive), innovational (rather than well-trained), permissive (rather than protective), and perceptive (rather than intuitive). The responses of the

hospital graduates place their approach to nursing in the "Modern" category. It is only on the Attentive-Responsive dimension that these hospital-trained graduates fall within the "Traditional" interval, suggesting their feeling that the nurse ought to be attentive (rather than responsive) to her patients.

Table 74, which shows a rank order of the dimensions by group, allows a comparison in terms of the relative importance of these dimensions to the Ryerson and hospital graduates. Being imaginative is very important to both groups (rank 1.5), being perceptive falls somewhere of middle importance (rank 3.5) and being flexible of somewhat lesser importanace (rank 7.5 and 6.5). There is, however, inncongruency in some of the other ranks. Being permissive, innovational and responsive is relatively more important to the Ryerson graduates; being analytic and flexible are rated higher by the hospital graduates. Whatsoever the relative importance of the dimensions, all of the scores, with only one exception, fall within the "Modern" approach to nursing.

TABLE 74

NURSING APPROACH SCALE
RANK ORDER OF DIMENSIONS FOR YOUNG RYERSON GRADUATES AND OTHER HOSPITAL-TRAINED GRADUATES WORKING ON THE SAME WARD, 1968-69

Dimensions Traditional-Modern	Graduates Ryerson N=17	Other Graduates From the Same Ward N=41
A. Attentive-Responsive	5.0	8.0
B. Confident-Analytic	7.5	1.5
C. Well-organized-Flexible	7.5	6.5
D. Well-trained-Innovational	3.5	5.0
E. Protective-Permissive	1.5	3.5
F. Dependable-Accountable	6.5	6.5
G. Efficient-Imaginative	1.5	1.5
H. Intuitive-Perceptive	3.5	3.5

In conclusion, while the Ryerson graduates are even more "Modern" in approach, their "values picture" is not contradictory to that of the hospital graduates'. Both, when measured on the *Nursing Approach Scale*, fall at or above the midpoint, within the "Modern" or "Very Modern" intervals in their orientation to nursing.[32]

PART VI — *Summary*

What then is the composite picture of the young Ryerson graduate that emerges from the data presented on the preceding pages? On the one hand, she is flexible, adaptive and independent. She is able to think things through, applies basic principles and is willing to learn. She is articulate and uses supervisory staff for support and reference. She respects herself and her patient, is interested in her patients and is able to give emotional support to them. She is an eager young woman skilled in the communication arts who fits well into the work world. On the other, she lacks self-confidence, is initially slower in procedures, needs extra help in taking charge, and in the eyes of the directors of nursing, has not had enough experience.

Her performance compares favorably with that of the average young hospital graduate. She feels she likes nursing better, and is able to give good emotional support. She is less confident of herself but still better able to "stand up" for herself. She is, if less efficient, more adaptive and willing to learn. She scores as highly as the hospital graduate in terms of Responsibility generally, and higher on the type of responsibility here identified as being "accountable for", that is, problem-solving.

The first impressions she both gave and retained tended to be of a young nurse who lacked confidence in herself but still was willing to learn and ask questions, who was interested and who could cope with both routines and emergencies. She fitted into the ward situation (which surprised her) for she found the staff pleasant and helpful. The head nurse compared her performance in terms of *Responsibility*, with that of the young hospital graduate. She was found not only to be as responsible as the hospital graduate, but also to excel in one particular form of Responsibility — that of being "Accountable for" herself and her patients.

The picture of the Ryerson graduate would not be complete, however, without noting the paradox which arises in the employers' comments. Directors of Nursing feel that Ryerson graduates, as compared with hospital graduates, required the extra practice and experience to be found on general wards. Yet, over half of the Ryerson graduates were assigned to specialty areas; no special orientation was given; employers were pleased with their performance; and the graduates were satisfied with their placement. The Ryerson graduate apparently fills to her own and her employers' satisfaction the positions that are available in the "work world".

Her approach to nursing, rather than being in any way contradictory, falls slightly higher along the scale but within the same

"Modern" dimension as the hospital school graduates with whom she works. Her orientation then complements that of the rest of the nursing staff, and at the same time, leaves her particularly interested in and eager for change.

It would seem then that the young Ryerson graduate's liking of nursing, her interest and her ability to think things through, help her to be a good nurse who gives more than adequate care to her patients, and who will continue to develop as a professional who contributes to nursing and to the community.

7. Discussion

To what degree does an individual *fit* within his environment? To what extent should the young graduate *fit* into the work world? Within the framework of a general discussion of *fit*, emphasis can be placed on the conceptual approach of adaptability, readiness for action and behavior appropriate to a situation, or on that of conforming to a particular shape, size or custom. When the concept begins to take on evaluatory connotations as a standard against which new members entering a profession measure themselves and/or are measured by the profession, one or the other aspect of the concept must be permitted to assume primary importance.

Does the Ryerson graduate, prepared in an educational program which is new and which departs from custom, *fit* into the world of nursing which has traditionally functioned within the limits of well-defined custom? The head nurses of the wards on which the Ryerson graduates work, the directors of nursing and the graduates themselves compared the Ryerson graduate with the average young hospital graduate. The Ryerson graduate likes nursing and patients better, is better able to speak for herself, gives emotional support with greater facility, more often realizes that there is more than one way to do a thing, is less confident but willing to learn, is more willing to take initial responsibility for herself but needs more initial help, is less efficient and is less willing to perform domestic chores. On the other hand, the average young hospital graduate is more likely to want to leave nursing, seems to hold her supervisor in greater awe, seems less aware of the need for emotional support, knows procedures better, is more sure of herself, looks more to those in charge to make decisions, is better able to organize on her own and to cut corners, and more readily accepts domestic chores as part of her duties. The head nurses saw both as being "responsible" nurses, but rated the Ryerson graduates higher on the aspect of responsibility which included behaviors related to the individual nurse's being accountable for herself while nursing

the individual patient. However, they in turn rated the average hospital graduate higher on being accountable to the appropriate person within the hierarchy, while participating in nursing care as part of the ward group.

Further, while few people seemed to know much about Ryerson and the nursing program there as such, the head nurses report that they and the rest of the ward staff were pleased with the Ryerson graduate's performance; the Ryerson graduate quickly became part of the ward social group and paticipated readily in joint ward activities. Many directors of nursing, while having little direct information about the individual graduate or for that matter about her program, frequently expressed the opinion that these graduates not having enough practice, should be treated differently from the average young hospital graduate, (i.e. be given an orientation, etc.)

If the question of *fit* is that of conforming to a particular shape or custom, then the position held by many of the directors of nursing is indeed appropriate. For fitting within the profession, and within the situation in which the profession functions, would be first a matter of shaping and preparing practitioners to custom. Any practitioner prepared in a "new" or different manner could be judged without knowing too much about that preparation and without having observed first hand the results of that preparation. The graduate and her performance would be by nature immediately outside of "custom". To "fit" she would require modifications or additions to turn into that type of practitioner defined by custom. In such a case, the appropriate reception into the work world of any graduate of a "new" or "different" character must be special internship, special orientation or some oher kind of special program. Such re-education would be directed toward helping graduates likes those from Ryerson conform to custom, as it has been traditionally defined, and eventually *fit* the world of nursing.

There is, however, still the alternate emphasis of *fit* proposed above; one of adaptability, readiness and appropriateness. Whatever a graduate nurse's preparation, be it new and different or in a mode defined through a hundred years of tradition, her performance as a professional warrants evaluation in terms of *fit* to the work world. Can she provide the professional services required in the time allotted, can she adjust and adapt as new stimuli arise? Can she make the decisions that require individual mature professional judgment? Can she be readily integrated into the social group of her peers? Can she relate to others on different levels of the hierarchy as valued col-

leagues as well as superiors? Many of the functions of the profession are defined by custom, the daily functioning of the professional in the work world requires behavior appropriate to the demands and needs of patients, colleagues, other related personnel as well as those of the employing institution. In terms of such criteria the Ryerson graduate indeed *fits*.

The question of *fit* cannot be limited to the individual functioning within the professional work world. An analogous question exists in terms of the profession's relationship within the health professions, specifically and within the community as a whole. The role of the doctor, the nurse, the social worker, etc., and their relationships to one another are known by custom. But custom does not readily allow the nursing profession to evolve toward a professional status, which it wishes, nor does it permit the evolution of "new" health professions such as medical assistants which many physicians wish.

Society changes rapidly, the health and welfare needs of the community are supposedly met by the health and helping professions. While custom might well have defined the professional role, if current social needs are to be met, the existing professions must adapt and initiate behavior appropriate to the situation. If they do not, these existing professions will decline and lose even their existing status while new or modified professions will develop to meet new and real needs. Does the nursing profession *fit* within society by providing appropriate service to the community? It will to the extent that the practitioners of the profession are adaptable, prepared and respond appropriately to the patients they serve; and to the extent that the profession as a whole develops and adapts its ends to the society in which it functions.

CHAPTER 11 — FOOTNOTES

1 Functioning successfully as a graduate in the work world goes beyond the ability to complete the required tasks. Corwin points out that success in an occupation requires both the internalization of the norms of that profession as well as friendship with the other practitioners, see R. G. Corwin *et al.*, "Social Requirements", for Occupational Success: Internalized Norms and Friendship", *Social Forces, XXIX*, 2 (December 1960), pp. 145-140. Other interesting studies on the *fit* of associate degree graduates into the work world has been done (M. Aasterud and K. Guthrie, "What Can be Expected of the Graduate with an A.D.?", *Nursing Outlook*, XII (August 1964), pp. 52-54).

2 For development and validation of the *Graduate Battery*, see Appendix.

3 Since two of the Ryerson graduates were enrolled in the degree program at a university, the director of this program was also interviewed.

4 The directors of nursing, on the whole, answered all of the questions contained within the interview guide, but they did not really seem to have first hand knowledge of the Ryerson graduates or of the nursing program

which prepared them; rather, they talked more of "two-year programs" and the graduates of such programs. Most referred to the reports of head nurses and supervisors in answering the specific questions posed them.

5 Sixty per cent of the directors of nursing stated in one form or other that they felt that graduates of the "new" or "two-year" programs were not on a "par" with hospital graduates but 92 per cent also stated that the Ryerson graduate they had employed performed as competently as other young graduates.

6 The head nurse did qualify this report with the explanation that the graduate had had a "very poor experience in another hospital" and needed the help, "mostly to get over this than anything else".

7 In the discussion of the "strengths and weaknesses" of the Ryerson graduate, later in this chapter, the problem arises of some "not knowing specific procedures or where certain things are kept". The type of orientation program these graduates received might, in part, help explain these difficulties.

8 Only one head nurse stated that she felt that the placement was unsuitable and problematic. On being asked to explain she said she saw the problem lying in the graduate herself, with her great lack of confidence, but went on to say that this was a problem of all young graduates coming to her ward (i.e. psychiatry).

9 The head nurses made nearly twice as many comments per respondent as did the directors of nursing — perhaps because their close contact with these graduates allowed "first hand" reports.

10 The question might be asked — if directing other staff, etc., lies with the function of the beginning graduate nurse? Forrest discusses the problem of utilization of associate degree graduates, in terms of the function for which they were prepared, see Betty Forrest, *The Utlization of Associate Degree Nursing Graduates in General Hospitals* (Ann Arbor, Michigan: University Microfilms, 1965).

11 It may be noted in the discussion of change in orientation for Ryerson graduates earlier in this chapter, only two Ryerson graduates were given extra help by the head nurses. One of these graduates was about to become an assistant head nurse.

12 In the discussion of "Creativity" (Chapter 6) the graduating Ryerson student is found to ask more questions and to suggest more alternate courses of nursing action — pointing to her interest in change and her originality of approach to nursing. Further, in the measurement of "Commitment" she is shown to be as responsible in her attitude toward the profession as other graduating students.

13 In the discussion of change and development in the graduating student (Chapter 6) a significantly higher proportion of Ryerson seniors as compared with seniors from three other schools of nursing, indicated that they wished that they had developed greater confidence in themselves.

14 Corwin, *Social Forces,* XXIX, 2 (December 1960), pp. 145-140.

15 Corwin discusses the difficulties which arise when the new professional feels conflict between the aims of education and of service and the fact that she often fears she will have to compromise her fundamental values in resolving this conflict, see R. G. Corwin, "The Professional Employee: A Study of Conflict in Nursing Roles", *The American Journal of Nursing,* LXVI, 6 (May 1961), pp. 604-615.

16 Haas discusses the normative expectations for the behavior of group members and the cluster of roles which constitute any position — roles which are in part learned as a student and exercised fully as a working graduate, see J. E. Haas, *Role Consensus and Disharmony in Hospital Work Groups* (unpublished Ph.D. dissertation, University of Minnesota), p. 57.

17 One of these head nurses felt that the staff looked down upon and resented the new graduate — the complaint seemed to be that she preferred to stay at the desk rather than helping out on the ward.

18 This includes one graduate whom the head nurses felt was treated as an inferior by the staff.

19 Two of these three opinions were qualified in that head nurses felt that this difficulty did not exceed that of the normal new graduate on the ward. They did not feel it should be attributed to the Ryerson graduate's preparation or to their work, but simply to being a new staff member within the ward group.

20 This graduate felt that the problem could be attributed to low standards on the ward and her fight to keep from being "dragged down".

21 This was, however, the same graduate whom the head nurse stated did not fit and who complained herself that the standards were low on the ward.

22 Included here are two graduates who were enrolled at university at the time — these two, however, did feel that they had no more problems than any other graduate in fitting into the university nursing program.

23 They seemed to feel this ability to think things through and to reach decisions on their own was far more important than knowing detailed procedures.

24 These function of the "professional nurse" as allowed by the young graduate's position and environment seem directly related to her satisfaction and the meeting of her expectations as a graduate, see H. A. Harrington, and E. C. Theis, "Institutional Factors Perceived by Baccalaureate Graduates and Influencing Their Performance as Staff Nurses", *Nursing Research*, XVII, 3 (May-June 1969), pp. 228; and Laura L. Simms, *Hospital Staff Nurse Position as Viewed by Baccalaureate Graduates in Nursing* (Ithaca, N.Y.: University Printer, Cornell University, 1964).

25 Harrington also points out that conditions within the environment frustrate and prevent graduates from functioning at what they believe is their full potential (Harrington, *ibid.*).

26 She had felt that one needed to be immersed in residence life and trained at a hospital to feel, as she stated, "dedicated". She seemed to be a loner who had not participated much in school life as a student nurse and was disappointed that this level of participation was not changed by becoming a graduate.

27 A hospital graduate with slightly less experience than her had been given a promotion to assistant head nurse which she felt was rightfully hers. She felt that this discrimination was directly due to her being prepared at Ryerson, but had never discussed the situation with her head nurse.

28 What behavior exemplifies the carrying out of responsibility in the nursing profession? (See Appendix for development and validation.) When a cross-section of nurses, staff nurses, teachers, administrators were asked to give examples of both responsibility and irresponsibility these examples fell into two main categories: behavior which could be put into the category of "accountable to" and behavior which further could be put into the category of "accountable for". With this simple dichotomy in mind, it was felt that an instrument could be developed with a view to evaluating responsibility in the new Ryerson graduate. It was felt that such an instrument would be useful in that a common criticism both verbally and in the literature concerning new "educational" and "two-year" programs is that a graduate from such a program does not learn responsibility.

29 For an excellent discussion of the whole topic of responsibility and the measurement thereof, see the work of E. Jaques, *The Measurement of Responsibility* (Cambridge, Mass.: Harvard University Press, 1956).

30 For a discussion of the two other forms of this instrument as administered to faculty and staff from cooperating agencies, see Chapters 7 and 9.

31 See Chapter 6 for a more complete description of this instrument and for the appropriate references. See Appendix for the development and validation.

32 The Ryerson graduates measure more "modern" on this instrument than do the students, but not as "modern" as the Ryerson faculty.

PART IV

EXIT FROM THE SYSTEM

CHAPTER 11

CONCLUSION — POTENTIALS IN THE SYSTEM

The nursing program at Ryerson Polytechnical Institute in Toronto was started in September 1964: The first diploma course in Canada to be located in an educational institution. This study, undertaken at the bequest of the Registered Nurses' Association of Ontario and with the consent of Ryerson Polytechnical Institute, was designed to evaluate the first five years of that program.

In this section of the report we seek to illustrate how the various factors and forces described in previous chapters impinge on and culminate in the student as represented by her performance during the learning period of the course proper, but particularly as a practitioner of nursing following graduation. This analysis provides the basis for answered the two questions posed by the Registered Nurses' Association of Ontario:

1. What type of nurse is being prepared through the Ryerson program?
2. Is this a practical way to prepare nurses?

A brief description of the purposes and design of the study is presented to illuminate the context or the theoretical framework within which the findings of the study are synthesized.

Purposes

The nature of evaluative research directed our task in this project.

1. A major undertaking of evaluative research, and therefore of this study, has been to outline the goals of the program, to gather information on the activities of various groups relative to these goals, that is students, faculty, and nursing service staff in agencies providing clinical experience, and describe the outcomes of their activities in reaching these goals. A study of three other schools of nursing along

similar dimensions for students and faculty provided a comparative focus, thereby permitting us to consider the Ryerson nursing program in broader perspective.

2. Another focus of evaluative research is directed toward an analysis of sources of difficulties as well as strengths in the program and, on this basis, to set forth guiding principles or procedures to support or complement particular aspects and to help lessen, if not overcome, problem areas. This aspect of the study is developed throughout, in the discussion portions of each chapter and particularly at the end in Part IV, Chs. 10, 11 and 12.

3. Finally, evaluative research is concerned with the validity of the goals themselves with respect to some wider purposes. These purposes as viewed by the Registered Nurses' Association of Ontario relate to the performance of Ryerson graduates in the employment situation and to the practicality of educating nurses in post-secondary educational institutions. We offer some questions and comments generated from the findings of this study relevant to the validity problem; however, the worth or value of the goals which the Ryerson program achieves must ultimately be answered by nursing in conjunction with the other health professions, by government, and by society at large.

Design

The *modus operandi* adopted and utilized through the research design has been that of a general systems orientation. Ryerson has been studied as a large system incorporating a number of subsystems while interacting with a number of other closely related systems (i.e. the nursing profession). Such an approach presupposes, and so permits, an explanation of a multitude of dynamic interactions throughout the system. However, without an example of a real and living individual (i.e. the student) moving into, through, and out of the system, the synstem tends to remain for the reader sterile and theoretical.

The student then can be seen both as the activating factor within the system and as the focal point of the forces proper to the system. Such forces as they are generated, and as they operate within the system, combine and interact to form clusters pressuring the student in specific directions as she moves through, and out of the system. These clusters of forces or vectors are at times simple and uni-dimen-

sional, having been generated within a single subsystem such as the student herself; at other times these vectors are complex, compound and multi-dimensional, having been formed in the interactions within several or all of the functioning systems and subsystems. Some vectors are, of course, very effective in that the components are not only cumulative but synergistic. Others are less powerful as the components maintain what seems to be only an uneasy alliance. However, whatever the stability or individual effectiveness of each vector, their combined effect is apparent in the type of graduate that exits from the system.

Learning to Nurse
Strengths and Strains in the System

From a study of the data presented in preceding chapters, at least seven main vectors within the total system become apparent. The following section describes each of these vectors in some detail.

1. The Nature of the Student Herself

The first vector chronologically, is generated within the student recruit herself, that is the cluster of forces arising out of her background, her self-concept and the growth and development process natural to her personality. This vector might be considered uni-dimensional in the sense that the components or elements are proper to the student herself as she enters and moves through the Ryerson system.

The Ryerson student comes out of homes and from families of diverse ethnic backgrounds, languages and customs. Her father tends to hold positions which are neither that of laborer nor executive; her mother helps provide financial support for the family. She chooses to enter Ryerson even though she is given little family or community support. As she enrols in the nursing program she sees herself as lacking self-confidence and as being average on organizational abilities, above average on self-discipline, and well above average on indenpendence.

As she moves through the system she frequently lives on her own and holds a job to help support herself. As she matures and develops she becomes more independent, but wishes she had also become more self-confident. Her most meaningful experiences are the interpersonal relationships in which she involves herself. Her personality development results in increased intellectual curiosity, insight, and ability to express her feelings and desires. Such are the cluster of forces that arise out of the self of the Ryerson student and which help

promote the development of what will be the Ryerson graduate.

2. Career Orientation of the Student

The second vector is again uni-dimensional, in that it is proper to the student herself, and it is perhaps even simpler in nature than the first as it is a specific manifestation of growth and development in the young adult. The Ryerson student chooses to become a nurse, at times against the advice of family and friends; she was attracted to this career as strongly by its external benefits (such as travel opportunities and salary) as by its ability to allow the individual to enjoy self-fulfilment or to contribute to family and community. She wishes to go on to post-graduate university courses, which she sees as crucial to higher level positions in nursing which she expects to be able to obtain. She is fairly familiar with the life style of the nurse, at least vicariously, in that she knew nurses and doctors, and she plans even if married a long term nursing career.

As she personally grows and develops she would like to have, in retrospect, done many things differently. She would not have chosen a different career. She would have liked, however, to have developed even further those professional skills and abilities she has begun to nurture. As she is assuming the role of young adult, her sense of commitment to the nursing profession grows strong. She develops and refines the core of a career orientation which was inherent in her even as a recruit. This orientation directs her, guides and serves her, as she prepares to exit as a nursing practitioner.

The effect of this vector, "the career orientation of the student", is enhanced, even magnified, as it arises from the same sources and pushes in the same direction as that of the "nature of the (Ryerson) student herself". What she is, what she is becoming, and the career to which she aspires operate as powerful forces within the Ryerson system.

3. Freedoms in the System

Once within a system the student may struggle to function because of its limitations or may be stimulated to grow, to develop and to learn because of the freedoms inherent in that system. The freedoms at Ryerson which act with vector-like force, are multi-dimensional arising out of the nature of the institution itself, the outlook of the faculty and life style maintained by the students.

Ryerson, on the whole operates, with a minimum of rules and regulations and attempts to impose few restrictions upon its students. The nursing faculty themselves feel relatively few limitations and

identify even fewer drawbacks whether in the decision-making process in their department, in their work assignments, or in their work load. They tend to be open-minded and receptive to new and changing ideas within themselves, and in turn are accepting of divergent views and novel ideas in the students.

They, as do other faculties, see the strength of their programs lying in the freedom to learn. They believe that the student has many rights, and so, corresponding obligations. Their approach to specific aspects of learning (i.e. they try to help the student internalize an approach to responsibility through problem solving), as well as to curriculum problems in general, is through emphasizing further investigation, rather than an immediate solution. They themselves seem to desire, not only to examine and explore problems in teaching nursing, but also to stimulate such exploratory behavior in the students while they are learning the art of nursing.

The faculty of Ryerson, not just as teachers, but as teachers of nursing, interpret nursing in a dynamic fashion. They view nursing as a process which involves observing, gathering data, relating nursing care to a goal to be accomplished for the patient, and assessing the results in terms of that goal. Freedom is accorded the student nurse to reach out and to develop her nursing skills; she is not beset by exhortations to know her weaknesses and her limitations. The faculty acknowledge their belief that students can learn to nurse in this way by having enough faith to teach them in this way.

Other elements of force, crucial to this vector, arise out of the nature of the student. These interact with those of the institution as a whole, and of the faculty, to effect a powerful compounded force. The Ryerson recruit particularly looks for a system which functions with a liberal program and permissive regulations as she chooses a program in which to study nursing. She maintains this chosen free life style over time, as she refuses to isolate herself within the limits of the program. She maintains many friends outside Ryerson, she lives away from Ryerson, she is often married and works at outside jobs.

She is relatively unimpressed by relationships defined basically by status or position. She is willing and able to disagree overtly with others around her, but she is seldom involved in or influenced by crises relationships with others, whether superiors or peers.

The freedoms allowed and encouraged within Ryerson act as an effective formative factor in preparing the graduate to enter a changing and challenging work-world.

4. Richness of the System

The "richness of the system" is also a multi-dimensional vector with a force which is effected in a synergistic-type relationship with the "freedoms of the system". It is complex in that it is generated not only within the institution as a whole, but also within the administration, the faculty and the students.

Ryerson is a large, active, multi-disciplined institution, housing many programs and a wide diversity of staff and students (5,000 students in 1969). The nursing program is designed to take advantage of the institution's facilities and to utilize the talents of the varied faculties. The administration, if at first uncomfortable with the "new" nursing program functioning within the accustomed setting, soon gave generous support which helped to integrate the nursing program and faculty within the larger system and facilitate utilization of the total available resources. The nursing faculty in return not only work to take advantage of what is offered but as they become integrated they contribute to the richness of the whole through the administrative positions they accept and through their active participation on general committees.

What the student does and what the student is provides the final elements of this vector. She belongs to school clubs and organizations and participates in student activities, not perhaps to a great number, but to a large enough variety that she is happy, adding to the general atmosphere feelings of satisfaction and achievement. She also finds in and contributes to this atmosphere, through her interaction with peers and faculty, intellectual stimulation and cultural inclinations. She does as well as the student from any other program in the general academic courses of the Institute. She develops a variety of different kinds of friends and a number of close friends.

The "richness of the system" is central in aiding growth and learning in the graduating student. Not only does it converge with the vector, the "freedom of the system", but it contributes to the effectiveness of the force generated by the very "nature of the student" herself as it promotes the development of a broad background, varied interests and an intellectual and cultural outlook.

While the "faculty role" may be in fact many faceted, as a vector directed to student formation, its force is generated within two main subsystems. The elements of "faculty role" arise out of the faculty's definition of that role and the level of the students' acceptance of such a definition.

5. Faculty Role

The Ryerson faculty choose to work at Ryerson because here they can participate in creating a curriculum for a new program. They assume individual responsibility for completing their work assignments and for developing course content and see little need for a stronger or more directive leadership. They view the nursing program, while specifically leading the student to professional practice, as being a functioning part of a larger educational institution. They see themselves as teachers first and nurses second — a self-concept permitting a relationship with students as that of guide and resource person rather than that of judge and model.

The Ryerson student accepts anud supports the role the faculty have assumed and therefore are open to its influence. On being recruited to Ryerson the student does not necessarily have high expectations of her relationships with faculty, but she soon finds that these relations have become crucial to her way of life and are, in fact, the source of major change within her over time. Not only does she feel that the faculty are more influential than peers and other members of the nursing profession, she also believes that their views on such matters as a nursing career are more like hers than are those of family, friends or relatives. She assumes that this relationship is the stimulating one of teacher to student and of potential colleague and future friend. In naming the figures she admires most the student places her faculty at the top of the list.

The role the faculty assumes promotes within the student the mastery of the professional role. At Ryerson it is also closely interrelated with and supports what the student is and is becoming as she assumes the role of an adult in a world of adults.

6. Professional Concept

The "professional concept" or ideal is not without influence at any school of nursing. This vector is multi-dimensional and is generated and maintained through the conceptual framework and approach and practice of nursing as demonstrated by faculty, students and other nurses with whom they have frequent contact.

The faculty, guided by their professional concept, lead the students through the crucial components of the curriculum which they develop. In describing critical aspects of nursing to be learned, faculty include fewer personality attributes and professional obligations than do faculty in the three other schools. They stress nursing as a response to a situation: the nurse's investigation, planning and subse-

quent course of action. The student is asked to evaluate the nursing she performs in terms of the consequence of such action. The student in turn looks forward to nursing in situations which permit and enable her to practise these various aspects of nursing; where perception of and response to the clues provided by the patient are crucial in planning and carrying out nursing care.

The faculty feel fairly strongly that the nurse should be responsive, analytic, permissive, perceptive and imaginative. The practising members of the profession put somewhat more emphasis on qualities such as being attentive, protective, efficient and well-organized. The student as she begins to internalize and maintain a "professional concept" ignores neither her faculty nor other members of the profession. While she agrees with the faculty in the qualities she feels the nurse should possess, she accepts these somewhat less strongly than they do. At the same time she appreciates to a certain extent some of the more "traditional" values held by the practising members of her profession.

The student recognizes the responsibility and commitment shown by the staff nurses as they nurse. She has, perhaps, internalized these characteristics with emphasis on aspects other than those accentuated by the staff nurse. More specifically, in assuming responsibility as a nurse, the Ryerson student feels that being accountable for herself nursing a patient is primary as compared with being accountable to a superior in the ward situation. However, she realizes that responsibility and commitment are essential to nursing, and learns from the ward staff and accepts their assistance in assuming the nursing role.

The "professional concept" proper to any school, influences the student as she prepares to practise nursing. It promotes within her the initial feelings of "being a nurse" which are realized fully as a practising member of the profession.

7. Integration Into the Professional System

While Ryerson, or any professional school, functions as a system in itself, there are forces within it geared toward "integration with the larger professional system". These forces are not always in perfect harmony and there exists the possibility of imbalance between the elements of force as generated within the faculty and within practising members of the profession. Such imbalance when pronounced, could reduce the efficacy of this vector.

The student also generates certain elements of this vector within herself. From the time of being recruited to Ryerson, she looks for-

ward to being in the clinical areas and to providing direct patient care. She finds clinical experience to be one of her more meaningful experiences. She also finds that as she moves through Ryerson, the closer she is to being a fully accredited practitioner, the more influence other professionals have in her life.

The faculty, in identifying important aspects of "responsibility", rate highest those behaviors involving an individual as being accountable for the nursing care given to the patient. But they still rate those behaviors necessary to participating in a ward or group highly and emphasize the necessity of realizing that each nurse is accountable to others in various levels of the hierarchy. The professionals who function in the clinical areas believe the latter, rather than the former, set of behaviors to be more important. The nursing staff in the clinical field want and like to work with the student. They try to encourage the student to participate in the ward and team activities and to function as part of the ward group. While they would like to help the students be more self-confident and better organized, they are unsure of their teaching role. Many feel that they may only replace unavailable faculty; yet faculty try to involve the staff and keep them informed. Frustration arises when either or both express the feeling that they understand poorly what the other is trying to accomplish.

However, whatever minor disharmony occurs between the elements of this vector, "integration into the ward system", its effectiveness can be seen in the graduating student who is eager and ready to fit into the work-world.

Exit — The Ryerson Graduate

The students recruited to the different schools of nursing show many similarities and some real differences. As they move toward being fully accredited practitioners, open to influences and involved in experiences proper to their educational system, these differences are increased and magnified. The statistical analysis carried out on data collected from beginning, intermediate and senior students at Ryerson and at the three other schools of nursing indicates that the number of significant statistical differences increases from period to period during the student's school life. It appears that the students from the four nursing programs are most alike at the beginning of their course, and that the Ryerson students become increasingly differentiated from the others as they proceed through their program and prepare to enter the work-world.

The graduate herself, her head nurse and her director of nursing evaluated the Ryerson graduate in terms of her strengths and dif-

ficulties. She is independent, flexible, is able to think things through, has a broad background and makes use of principles in reaching and carrying out decisions. But, she lacks self-confidence, at times "goes too far", and while she quickly "catches up" she feels that she is initially slower in doing specific procedures. Further, she participates in ward activities, is articulate, has suggestions, is interested in change, is willing to learn, accepts criticism and uses staff as resource persons; however, she also needs more initial support and help in taking charge and dealing with doctors and other staff. Finally, while she respects herself and her patients, cares about them, is interested in and able to teach them, gives them emotional support and is competent and able to accept responsibility, at the same time, she believes that she has to prove herself, is trying to develop a feeling of being a "real nurse", and lacks some initial organizational powers and the ability to "cut corners". The directors of nursing add one more difficulty that is not recorded by the head nurses who work directly with the Ryerson graduates, that is, that she has not had enough practical experience. It is one that seems more a prejudgment of her program than an evaluation of her performance; as, the method of placement and the orientation program for new employees was neither modified nor altered by the nursing departments which employed the Ryerson graduate. The head nurses see the Ryerson graduate as a willing and able staff member and indicate that they favor her type of nursing preparation.

The nursing values held by the Ryerson faculty are more modern than those of Ryerson students and considerably more modern than those of nursing service personnel in the clinical fields. Yet Ryerson graduates tested later in the work situation held more modern values which closely approximate those of faculty. It is sometimes said that once in the employment situation, the newly educated professional tends to lose the focus and direction provided in her training program to take on the values and ways of the work situation. Here the Ryerson graduates in their later development, are seen assuming values more characteristic of modern nursing as displayed by school of nursing faculties and becoming less like the nursing service personnel with whom they work. Practitioners of this type would appear to operate more independently of other workers and have the kind of attributes required in our changing and developing health services.

The picture of value development in Ryerson graduates contrasts at times with the evaluation process of Ryerson students in the ward setting. Clinical field persons tend to judge the Ryerson students' performance as though they were already graduates. They seem to judge

that what they observe, even very early in the students' career, is characteristic of the performance of these students in the future. This evaluatory process was probably better justified by the more traditional nursing program where students learned most of their nursing early and tended, during the remainder of their "training", to practice already acquired skills or to contribute to service in payment for their education. For this reason, while the perfecting of skills occurred little essential change was expected in student performance through time. Assessment at one point, then, might have stood as a valid sample of the student's nursing performance through the years. The Ryerson student, however, tends to show a pattern of growth and development; a pattern which seems to continue even after she has assumed professional role and status.

To answer the question posed by the Registered Nurses' Association of Ontario: What kind of nurse is being prepared through the Ryerson program?

> She is a nurse who can and does give good nursing care and who at same time has the potential and is already exhibiting characteristics of growth and development both as an individual and as a professional.

The reader may examine this description of the Ryerson graduate against the aims as outlined in the calendar of the Ryerson Polytechnical Institute and by the faculty of the Department of Nursing.

The aim[2] of the Ryerson nursing program as set down in the calendar is as follows:

> The course has as its aim the graduation of nurses who will be qualified to accept positions as staff nurses in active treatment hospitals or other institutions for the care of mentally and/or physically ill persons of all ages. In addition, the graduate will be qualified to function in any other capacity which requires similar skills and knowledge to those of the staff nurse; e.g. in private duty nursing, in medical clinics and doctors' offices.

At the time of the present study the Nursing Department at Ryerson had outlined some general goals or objectives to guide the development of their program.

> The Ryerson course is directed toward those aims which relate to the nurse who has a broad education; a sound basis in the sciences including behavioral sciences; a thoughtful and analytical approach to the nursing of patients; an independent, questioning, and confident outlook on nursing care and on health services in general.[3]

Consideration will now be given to the second question raised by the Registered Nurses' Association of Ontario:

Is this a practical way to educate nurses?

The question of practicality as it applies to a system may be answered in terms of the functioning of the system itself or in terms of the product which derives from that system.

Ryerson as an educational institution had been functioning long before the introduction of the nursing program. Initially there was a period of adjustment between the nursing program and Ryerson. The program was viewed as quite costly owing to the higher ratio of teachers to students; enrolment was low and recruitment a problem; and the program did not appear to fit into the structure of faculties and departments. Later the costs of various programs including nursing were seen to even out; some requiring more equipment, others more faculty; admission figures increased; and the nursing course found a home in the Ryerson organizational structure.

Not only did Ryerson provide a nutritive setting for the nursing program but forces generated within the program itself seem now to enhance the institution as a whole. The nursing staff which originally relied on the help and support of the administration and other faculty in designing and initiating their program soon began to contribute to the development and growth proper to Ryerson as an educational institution. Both students and faculty take an active part in committees, working groups and endeavors of the Institute. The need for graduate programs to meet requirements for specialized services in the hospital field were detected early and, to date, at least three new programs have been developed for diploma graduates. The faculty of the Nursing Department continues to increase and the first chairman of the department has now been appointed to the position of Acting Dean of Community Services, the Division housing the Department of Nursing.

These developments in the Department of Nursing appear as powerful indicants of the viability of this program within the larger educational institution and attest to the practicality of locating educational programs for nurses within the general system of education.

A second criterion of practicality is the quality and quantity of the product which exists from the system, considering the amount of energy the system must expend. Ryerson graduates are now ready to enter the work world after two calendar years or six semesters

of study, allowing more students to utilize the same facilities in a shorter period of time. Every year the number of graduating students increases. Although students frequently work and look after their own accommodations, we can only say that these circumstances tend to support their initial desire to be independent and to maintain responsibility for themselves. Furthermore, these conditions prevail for all students at Ryerson and in general for those at colleges and universities in our society.

The Ryerson graduate as she actually enters the work world is judged by other professionals to be a responsible nurse who gives more than adequate care, who *fits* easily into the work situation and who has the potential for professional growth. At the same time she displays interest in improving the care of patients and participates readily with others in activities directed toward this end. Given the changing nature of our health services, potential for action in this sphere adds an extremely practical dimension.

The Ryerson graduate finds that not only is she able to meet the expectations of others in the work situation, but also, her expectations of life as a graduate nurse are met. In this latter sense of practicality, that of meeting the demands and needs of the public utilizing or being serviced by the product of the system — the criteria have again decided affirmatively. The Ryerson nursing program is a practical way to prepare nurses.

Problems Which Threaten Practicality

The results of this study lead us to believe that preparing nurses in an educational institution at the college level meets the criteria of practicality as defined in this study. However, there are problems which may threaten this practicality and jeopardize the future of diploma nursing education in the colleges.

We wish to note at the outset the preparation of faculty of the Nursing Department at Ryerson: of the ten instructors, eight held a baccalaureate and two a master's degree. The mean age of teachers was 31.6 years and the average amount of experience in teaching was 5.5 years. Our study has been concerned then with a reasonably well-prepared faculty, both in terms of education and experience.

Three problems, other than faculty, confronting the Ryerson program and undoubtedly any program at the college level are discussed in the following section.

Length of the Program
Four or Six Semesters?

In the various studies of nursing and in the proposals and recommendations respecting the categories of nurse required to fulfil an expanded nursing role in our society, it is evident that both the nurse prepared in the university and the nurse prepared in the college are called upon to practise their profession at a high level of performance, comparable to that required of other professional services in our society. The continuity of relationship between nurse and patient within the context of the family and community both in health and illness requires understanding, judgment and interpersonal skills of the highest order.

Preparation of the nature described above dictates that programs contain a major component in nursing plus strong support in the humanities and in the biological and social sciences. The Ryerson nursing program is a six-semester course combining the major in nursing with six semesters of social science, six semesters of humanities including political science, and six semesters of physiological science including one semester in nutrition. According to one of the senior staff at Ryerson, the preparation of the technologist requires six semesters as compared with four semesters for the technician.

This project studies the education of the nurse at the level of the technologist, it does not examine the four-semester program or other shortened versions. However, the question of content and length of the program for the preparation of the nurse at the diploma level must be pursued and eventually answered. In an experimental sense, it is not feasible at this time to demonstrate differences in performance of graduates of programs of varying lengths, as there is much variation in their content and, furthermore our health services are rapidly changing and to date are not geared to varying levels of performance in practitioners. As the majority of our programs to prepare the highly skilled technologist require six semesters, should nursing not follow a similar path at this time to permit us to identify and describe what can be accomplished within a program of this nature? We should note that admission requirements to a four-semester program may require an additional year of school at the secondary level, — a factor to be considered. In any case, the findings of this study describe learning to nurse in a six-semester program.

College Education for the Diploma in Nursing
Slow or Rapid Changeover?

On the whole, the findings of this study point to the potential value

of preparing a nurse in a college-level institution within the general system of education. The question arises as to whether we wish to support a gradual transformation or proceed as rapidly as possible to modify the system of nursing education at the diploma level. There is much to be said for careful and thoughtful planning so that change and development may be smooth, predictable, and in a sense evolutionary, even though our knowledge may be faulty and seldom sufficient to achieve these ends. The study of the Ryerson nursing program, however, identifies some of the problems in a situation where the changeover is gradual. These findings help us to become more aware of the innovators' dilemma in functioning as a minority movement.

In the initial phases of an isolated endeavor, such as the Ryerson nursing program, much effort and energy is required to interpret the new course within the educational institution where it is located and, at the same time, to one's own professional colleagues outside who are sustaining traditional patterns. Building a network of effective communication in this fashion as a basis for action and development encounters many barriers and the results depend to a great extent on the relationships among a very small number of people. For example, in the Ryerson situation, clinical facilities, large in number and in close proximity to the Institute, became increasingly unavailable to the small group of students studying in the new program. Decisions of large institutions to favor their own educational programs for nurses may be viewed as reactionary, but we might well ask why hospitals with well-established schools would support and cooperate with a new type of program, which in their view is probably not in their own best interests. Undoubtedly, education for the health services is overloading clinical facilities in most large urban centres. In the meantime a gradual changeover from the hospital to the college system for educating nurses maintains the system of ascribed or inherited rights to the clinical field by hospital schools of nursing and delays the day when educational needs can be assessed and clinical facilities allocated on a more objective basis.

As a minority group, innovators in nursing education, i.e. the faculty, feel compelled to prepare persons to *fit* into the present system of health services. They are well aware that graduates of their program will be measured against criteria arising from administrative and nursing personnel in various hospitals and agencies. To obtain acceptance and sanction of the program among their colleagues, faculty feel committed to the preparation of nurses in the traditional sense. It appears from this study that graduates from Ryerson do

practise nursing as expected in the service field and do *fit* readily into the work world. Yet, at the same time, they demonstrate understandings and skills related to the improvement of patient care and to the promotion of change in nursing services. We might ask to what extent this duality of goals impedes progress in achieving the purposes of a particular type of experimental program or, on the other hand, influences faculty in a new program to espouse the notion of *fit* of their graduates into the existing system as the ultimate criterion. In any case, on the basis of the recommendation in recent studies of health services to locate health centres and facilities in the vicinity of the people using them, and of the response of nursing that both the diploma and university-prepared nurse will be needed to a much greater extent outside hospitals, we might well inquire into the reasons why experience in the larger community does not constitute a greater part of the Ryerson nursing program than it does.

In our study of the performance of Ryerson graduates, we unearthed a stereotype of the performance of graduates of college programs in nursing which was subscribed to most by persons having the least contact with such graduates. This stereotype includes the notion that the college graduate cannot do technical procedures with skill, is slow and disorganized, and is unable to assume responsibility. Our interviews with directors of nursing lead us to conclude that although directors usually describe the nursing performance of Ryerson graduates positively in most respects, they attribute these abilities to the individual and not to the program. In fact, in our interviews, once the Ryerson graduate had been discussed, the director frequently reverted to the problems of nursing service, — the extended type of orientation required and the extra time graduates from college programs would take before they were able to assume responsibility when graduates from hospital programs were no longer available. It may be noted in the chapter describing the performances of Ryerson graduates that while the orientation was altered in only one case, the placement of the graduate never had to be changed because she came from a college program. In contrast to the directors of nursing, we found that head nurses who work with Ryerson graduates side-by-side in the hospital unit respond to their nursing performance on an individual basis. If there were many more nursing programs within the college system in Ontario, possibly the stereotype held by directors of nursing in particular, would encounter greater competition from the real-life performance of the graduates of these programs.

Relation of Faculty to the Clinical Field
In or Out?

Owing to a variety of circumstances, the faculty and students of Ryerson have been required to travel considerable distances to obtain clinical experiences. In addition, sometimes the institution was able to take the students, other times not; other agencies with crucial facilities have been unable to take Ryerson students at any time. A description of what is accomplished in such a fluctuating and haphazard learning situation is presented in this report of the Ryerson nursing program. However, it is beyond the scope of this study to identify that which is not accomplished or which could be achieved if clinical facilities were available, near at hand, readily accessible, and of the type required. These requirements are of greater concern for the future of nursing.

Another dimension of this problem relates to the position and function of faculty *vis-à-vis* the clinical field. At a time when health services are changing rapidly, faculty need to be active practitioners in some aspect of nursing both to influence change and to incorporate new knowledge and skills within their expertise. Such a move focuses the direction of both educators and service personnel on the development of health services, thereby strengthening the clinical practice field for student learning as well as maintaining faculty on the frontier of knowledge. New role relations between faculty and nursing service personnel require continuity of contact and opportunity to work together on a regular basis on problems of nursing, teaching, etc. Further discussion of the relation of faculty to the clinical field may be found in Chapters 9 and 12.

The problem of clinical facilities is not a problem threatening the practicality of preparing nurses within the general system of education, but a practical problem facing health professions, hospitals and agencies, government and the public. Everyone is suffering in the interim and change and development in health services is stifled.

Footnotes

1 Schools providing a comparative focus are automatically placed at a disadvantage in that the categories or dimensions of study are, in many instances, aspects or units reflective of the aims of the main program under study. In other words, the schools used in comparison are probably directing their efforts to quite different ends or goals, more particularly at the operational level. No attempt has been made in this study to assess the extent to which the above comparison schools achieve their own goals.

2 From the calendar of Ryerson Polytechical Institute, 1969, p. 136.

3 Communications from faculty of the Ryerson Nursing Program, 1966-67.

PART IV

EXIT FROM THE SYSTEM

CHAPTER 12

THE TEACHING OF NURSING
A HISTORICAL PERSPECTIVE

In our recent apprentice-type programs the teacher of nursing was the head nurse of the ward. Here a minimum of separation obtained between nursing education and nursing service. The head nurse had great influence on the type and quality of nursing practice and, at the same time, had almost complete control of the students' time and assignments. Students were gradually socialized into the approaches and methods of nursing as demonstrated by the head nurse and senior students in the ward. In this sense the head nurse modeled the ideal version of nursing and students endeavored through successive trials to approximate and eventually to replicate it. This situation encompassed many requirements for learning: The similarity of nursing content between what was taught the student and what was performed in the ward; the proximity of the teacher-head nurse and the student to the nursing situation and of the former to the day-by-day development of the student; and ultimately the broad experiential base from which the student's nursing knowledge could be derived.

During this era "good nursing" was achieved through individual nurses being committed throughout their career to the provision of nursing care as they had been taught.

Until recently separation of education and service has been only partially complete owing to the common roof both have shared. The movement to separate education from service was characterized by the "expansion of knowledge" syndrome where teachers taught the "theory" in the classroom and students entered the hospital wards to apply this knowledge and to practise until learning had been achieved. This phase is designated by such maxims as "correlation of theory and practice" and "apply the principles". In this setting nurse-teachers strive to learn the content of non-nursing subjects, i.e. physiology, sociology, psychology. They are not concerned solely with making the subject relevant to nursing, but view the application to nursing as a major part of their function in the

clinical field. For this reason, teachers of nursing feel compelled to become knowledgeable in many fields while often lacking a sufficient base in the science of the discipline itself. In this way quantities of content are passed on to the student with the expectation that this knowledge be applied; frequently leading the student to perceive spurious or pseudo relationships in the patient situation. Knowledge from related disciplines serves as the "theory of nursing" which teachers seek to promote, because once mastered at even a factual level it carries an aura of the academic and esoteric and concomitantly higher status among colleagues.

In this approach to nursing education the teacher becomes more and more remote from the reality of the clinical field and subsequently relieved of a vital role in the teaching of nursing. Teachers gain control of the student's time and nominally of her assignments, whereas their influence on the type and quality of nursing practice diminishes. This state leads to an educational era where teachers stress "the ideal", a type of nursing both unreal and possibly undesirable for the patient. Students in their pragmatic fashion meet the teachers requirements in the school, but really learn to nurse in the hospital wards. What teachers gain in control of students, they lose in control of what students learn. In addition, teaching of necessity relates more to nursing individual patients, as the teacher is less involved with the more complex aspects of nursing at the team, group or unit level. As might be expected with this approach to nursing education, teachers view the clinical field as a "given", something over which their influence is negligible.

Under these circumstances "good nursing" depends on the application of knowledge from other disciplines and this belief is reflected in the curriculum which allows for the application of related theories in representative nursing situations. Here nursing knowledge, an accumulation of theory and facts from other fields, can be known apart from the actual nursing situation. Through this approach, previously labelled Nursing as Content or Nursing Known *a Priori*, the schism widens and the disparity between education and service grows, to the point that many are questioning the relevance of nursing education for the critical problems of our times.

Of the four models of nursing education presented in this section that identified as Nursing as Content is a strong competitor for acceptance in schools organized outside hospital: For, its basic tenet, the dichotomy of theory and practice, is readily implemented when a school or college is physically separated from health service agencies. In these new programs there is greater effort to ensure the application of principles in clinical practice through the selection by faculty of

fields for student experience (a mixed blessing if we read Chapter 9), by greater control of students' assignments, and by more direct supervision and guidance of students by instructors.

From the findings of this study we might say that School A epitomizes this approach to nursing education followed by School B to a lesser degree. As of 1968-69 School C with a foot in the apprentice method is making haste to associate itself with a more modern approach to nursing education. There is some evidence to suggest its affiliation with the position just described.

Another competing view of nursing education places less emphasis on "good nursing" known *a priori* and more on an approach to nursing which permits the student to respond to the patient situation, to examine the process and the consequences of nursing, and to learn from the experience. The teacher is concerned with a way of teaching which assists the student to nurse in response to the individual situation, to attach meaning to her experience, and to use it to enlighten and to test out her ideas in subsequent situations. Many teachers now wish to assist students directly in learning to cope in nursing situations: to gather information, to observe relationships, to make an assessment and a plan of care, to put the plan into operation, and to examine the consequences. Knowledge of nursing gained during the nursing process is thus constantly fed back into nursing practice.

To nurse implies knowledge, however there are other paths to nursing knowledge than those suggested by the approach to professional education bearing the dictum, "learn the knowledge and apply it in the field". One of the Ryerson faculty made a remark relevant to this argument when she stated that with the teaching of non-nursing subjects "stripped away" in the Ryerson program, the faculty were able to concentrate all their effort on the *teaching of nursing*. One might expect then that a focus on the teaching of nursing itself is supported to a greater degree than we realize when non-nursing courses are taught by psychologists, biologists, and sociologists within the educational institution. The movement of nursing programs into the general educational system at the level of higher education may well provide the leverage to propel nurse educators to concentrate on the teaching of nursing and the process of learning to nurse.

The approach to the teaching of nursing described in this section we have termed "Nursing as a Process" or "Situation-Responsive Nursing" and have found it to be most characteristic of Ryerson. As has been previously noted, Ryerson faculty do not express greater commitment to a modern form of nursing than do faculties of the other schools. In addition, they are not preparing a special kind of

nurse, but rather a nurse who can work effectively in the work-world and participate in change as it occurs. They do not perceive themselves as experts or pioneers in nursing but rather in the *avant garde* with respect to the teaching of nursing. In their setting the Ryerson faculty have ample opportunity to concentrate on the teaching of nursing: how to approach a nursing situation, how to work with others to find the most effective care for individual patients, and how to learn through experiences to add to their repertoire of nursing knowledge and skills. There is evidence to show that School A also supports this approach to the teaching of nursing, but is experiencing a degree of conflict in seeking a compromise within this dichotomy of approaches to nursing education.

In nursing programs organized outside hospitals, the traditional relation of teachers of nursing to the practice field has been severed. It is becoming increasingly clear, however, in the developing professions and technologies that to teach one must practise or be involved with practice; to be part of the changing field, to influence practice in the service situation, and to maintain teaching and learning constantly attuned to the real condition. This movement is depicted by the modern day emphasis of many professions and disciplines on action through involvement and participation. In nursing education the approach is being built on the belief that participation with specialists in nursing in action directed towards quality nursing will provide desirable learning experiences for students. More obvious is the assumption that a clinical field of high quality will emerge as nursing services improve through the practice, examination, and study by our best prepared nursing personnel. Let us suppose that we are able through this method to influence quality as well as demonstrate the full function of nursing as our profession envisions it in the expanding health services of this country. We shall then have a clinical field where students will once more be able to learn by being involved with teacher-practitioners and their service associates in the practice of nursing.

The process of learning will differ from that of apprenticeship where students learn to model their behavior on that of the head nurse or of others with more experience. In this method of the future much effort will be spent in examining and rationalizing the nursing process in which students and faculty are absorbed, in testing out ideas gleaned from this practice, in building hypotheses, and in accumulating more productive nursing knowledge. Undoubtedly, greater realism as to curriculum content should accompany the movement to engage faculty in the practice field. This mode of learning of action

DIAGRAM 5

APPROACHES TO NURSING EDUCATION

Model 1	Model 2	Model 3	Model 4	Model 5
		KEY WORD		
Procedures	Knowledge	Experience	Participation	?
		NURSING		
An ideal of nursing and the motivation to pursue it	Quality nursing depends on the application of knowledge from related fields and diciplines	Increased knowledge is gained through the continuous examination of practice	Development of nursing depends on realistic participation of both faculty and students in nursing practice	?
		EDUCATION		
Apprenticeship-practice	Application of theory in representative situations	Assessing, planning, and evaluating the outcomes of nursing care	Teachers and students-nursing action and study	?

and study will be enhanced by the many new teaching devices to record, develop, and analyse micro-nursing situations.

In nursing the major movement in this direction has been proposed and is being implemented by faculty in some university schools of nursing. The types of participation of faculty in the service area vary and are yet largely unexplored. We are now in the stage of experimenting with different types of plans and generally trying to sort out relations between agencies and university faculty and to assess their productivity. To date we have not seen the same type of development in diploma or college programs outside hospitals but undoubtedly the trend will encompass them, albeit with different emphases and purposes.

These patterns in the development of programs in nursing education may seem ideal in nature and therefore spurious and misleading. Undoubtedly, all programs demonstrate characteristics of each phase, but it would appear from the responses of faculty in this study that each of the four programs has some modal set of beliefs which we have tried to capture here and to outline so as to sharpen the positions in the educational argument. The following chart depicts the main features of each of these movements in nursing education; however, there is no assumption of a necessary progression from one model to another.

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